

RESOLUTION NO. 2023-2295

A RESOLUTION OF THE MAYOR AND COUNCIL OF THE CITY OF GOODYEAR, MARICOPA COUNTY, ARIZONA, APPROVING THE THIRD AMENDMENT TO THE INFRASTRUCTURE DEVELOPMENT AGREEMENT FOR PROJECT 10-11; AUTHORIZING AND DIRECTING THE CITY MANAGER TO EXECUTE THE THIRD AMENDMENT; PROVIDING AUTHORIZATION FOR FUTURE ACTIONS; AND PROVIDING FOR AN EFFECTIVE DATE.

WHEREAS, in 2018, Microsoft acquired approximately 279 acres of real property within the City of Goodyear generally located between the north side of Broadway Road and the south side of MC-85 and extending from east of Bullard Avenue to west of Litchfield Road that it is developing under the name Project 10-11 (the "Property"); and

WHEREAS, Microsoft is responsible for the design and construction of all public infrastructure, within the boundaries of the Property and outside the boundaries of the Property as reasonably determined by the city to be both in accordance with the duly-adopted Development Regulations and engineering studies needed to support the development of the Property and to allow the city to provide city services to the Property; and

WHEREAS, Microsoft's plans for development of the Property have changed over time and instead of treating industrial discharges so it could be used as a raw water source for potable water production, Microsoft's plans call for the distribution of industrial discharges to the city's 157th Avenue Wastewater Treatment Plant for treatment; and

WHEREAS, Microsoft and the city entered into that certain Infrastructure Development Agreement for Project 10-11 recorded on June 27, 2019 in the official records of Maricopa County, Arizona at recording number 2019-0486224 (hereinafter referred to as the "PHX 10-11 IDA"), which addressed certain requirements regarding the development of the Property, including requirements for infrastructure that were to be completed before any certificate of completion and/or certificate of occupancy would be issued for the First Phase Development being constructed on the Property (the "Phase One Improvements") and operational requirements regarding the level of Total Dissolved Solids ("TDS") that could be delivered to the city's 157th Wastewater Treatment Plant; and

WHEREAS, Microsoft and the city entered into that certain First Amendment to Infrastructure Development Agreement for Project 10-11 recorded on July 14, 2020, in the official records of Maricopa County, Arizona at recording number 20200625939 (hereinafter referred to as the "First Amendment"), which modified the requirements for obtaining certificates of occupancies or completion for the Phase One Improvements; and

WHEREAS, Microsoft and the city entered into that certain Second Amendment to Infrastructure Development Agreement for Project 10-11 recorded on April 27, 2021, in the official records of Maricopa County, Arizona at recording number 2021-10468656 (hereinafter referred to as the "Second Amendment"), which provided a temporary solution for the development of the Phase Two Development (PHX 11) by identifying infrastructure requirements, operational requirements and timing for the completion of such infrastructure; and

WHEREAS, the construction of PHX 11 is almost complete and Microsoft is seeking a permanent certificate of occupancy for PHX 11 and a building permit for the Phase Three Development (PHX 12); and

WHEREAS, Microsoft has not completed the infrastructure improvements it was to construct as a condition of receiving a permanent certificate of occupancy for PHX 11; and

WHEREAS, until the city's 157th Avenue Wastewater Treatment Plant has been expanded, the city is not in a position to accept discharges in excess of 500,000 gpd; and

WHEREAS, the Third Amendment to Infrastructure Development Agreement for Project 10-11 modifies the conditions required for the city to issue a permanent certificate of occupancy for PHX 11, sets forth conditions for the issuance of a building permit for PHX12, sets forth conditions for the issuance of a certificate of completion, temporary certificate of occupancy and permanent certificate occupancy for PHX 12, provides a temporary infrastructure solution and temporary conditions for operations that allow for the continued development and operation of the PHX 10-11 Site until the city's 157th Avenue Wastewater Treatment Plant has been expanded, and imposes permanent operational requirements once the city's 157th Avenue Wastewater Treatment Plant has been expanded.

WHEREAS, the city acknowledges the development of the Property is consistent with the city's general plan; and

WHEREAS, Microsoft and the city intend this Third Amendment to be a Development Agreement within the meaning of A.R.S. § 9-500.05 that binds Microsoft and all future owners of all or any portion of the Property.

NOW, THEREFORE, BE IT RESOLVED BY THE MAYOR AND COUNCIL OF THE CITY OF GOODYEAR, MARICOPA COUNTY, ARIZONA, AS FOLLOWS:

SECTION 1. The Mayor and Council of the city of Goodyear find the approval of the Third Amendment to the Infrastructure Development Agreement for Project 10-11 by and between Microsoft Corporation, a Washington corporation, and the city of Goodyear, an Arizona municipal corporation, a copy of which is attached hereto as Exhibit 1 and incorporated herein by this reference, to be in the best interest of the City of Goodyear, and hereby approve the Third Amendment to the Infrastructure Development Agreement for Project 10-11.

SECTION 2. The City Manager or her designee is hereby authorized and directed to execute the Third Amendment to the Infrastructure Development Agreement for Project 10-11.

SECTION 3. The City Manager or her designee is hereby authorized and directed to take any and all actions and to execute all the documents necessary to carry out the intent of this Resolution and the terms of the Third Amendment of the Infrastructure Development Agreement for Project 10-11 (the "Third Amendment"), including any amendment to the Well Sharing and/or Water Wheeling Agreements determined by the City Attorney or designee as being needed to comply with the terms of the Third Amendment as approved by the City Attorney or designee.

SECTION 4. Unless referred to the voter as provided by law, Resolution 2023-2295 shall be effective thirty (30) days after its adoption by the Mayor and Council of the City of Goodyear.

PASSED AND ADOPTED by the Mayor and Council of the City of Goodyear, Maricopa County, Arizona, by a _____ vote, this _____ day of _____, 2023.

Joe Pizzillo, Mayor

Date: _____

ATTEST:

APPROVED AS TO FORM:

Darcie McCracken, City Clerk

Roric Massey, City Attorney

EXHIBIT '1'

THIRD AMENDMENT TO THE INFRASTRUCTURE DEVELOPMENT AGREEMENT
FOR PROJECT 10-11

WHEN RECORDED, RETURN TO:

City of Goodyear, Arizona
Office of the City Clerk
190 N. Litchfield Road
Goodyear, Arizona 85338

**THIRD AMENDMENT TO INFRASTRUCTURE DEVELOPMENT AGREEMENT
FOR PROJECT 10-11**

This Third Amendment to Infrastructure Development Agreement for PHX 10-11 (the "Third Amendment") is entered into by and between Microsoft Corporation, a Washington corporation ("Owner") and the City of Goodyear, an Arizona municipal corporation (the "City").

RECITALS

A. WHEREAS Owner owns approximately 279 acres of real property within the City of Goodyear generally located between the north side of Broadway Road and the south side of MC-85 and extending from east of Bullard Avenue to west of Litchfield Road, as legally described in Exhibit 1 attached hereto and incorporated herein by this reference.

B. WHEREAS, Owner is developing the Property under the name PHX 10-11.

C. WHEREAS, Owner is responsible for the design and construction of all infrastructure, within the boundaries of the Property and outside the boundaries of the Property as reasonably determined by the City to be both in accordance with the duly-adopted Development Regulations and needed to support the development of the Property and to allow the City to provide City services to the Property.

D. WHEREAS, Owner initially intended to develop the Property in phases, and anticipates that when fully developed the Property could consist of five (5) buildings that would use direct evaporative cooling (water cooled, each of which would require no more than, 1 MGD (million gallons per day) of water with a maximum amount of 5 MGD of water to be delivered to serve the Property.

E. WHEREAS, Owner's plans for the development of the Property have changed and only three buildings on the Property will utilize direct evaporative cooling (water cooled), and all additional buildings developed on the Property will utilize air-cooled chillers (non-water cooled).

F. WHEREAS, the first phase of the development of the Property consisted of the construction of one building that is approximately 290,000 square feet; and the second phase of the development of the Property consists of the construction of a second building that is approximately 250,000 square feet; and the third phase of the development of the Property shall consist of one building that is approximately 250,000 square feet.

G. WHEREAS, Owner and the City entered into that certain Infrastructure Development Agreement for Project 10-11 recorded on June 27, 2019 in the official records of Maricopa County, Arizona at recording number 2019-0486224 (hereinafter referred to as the "PHX 10-11 IDA"), which addressed certain requirements regarding the development of the Property, including requirements for infrastructure that was to be completed before any certificate of completion and/or certificate of occupancy would be issued for the first building being constructed on the Property, and that certain First Amendment to Infrastructure Development Agreement for Project 10-11 recorded on July 14, 2020, in the official records of Maricopa County, Arizona at recording number 20200625939 (hereinafter referred to as the "First Amendment"), which addressed the timing of certain portions of the Phase One Improvements by Owner and the completion of the Raw Water Line by the City, and that certain Second Amendment to Infrastructure Development Agreement for Project 10-11 recorded on April 27, 2021, in the official records of Maricopa County, Arizona at recording number 20210468656 (hereinafter referred to as the "Second Amendment"), which addressed the conditions for issuance of building permits for the Phase Two Development. Together, the PHX 10-11 IDA, the First Amendment, and the Second Amendment are referred to herein as the "Agreement."

H. WHEREAS, under the terms of the PHX 10-11 IDA, Owner was to construct all improvements needed treat the industrial discharge from the Property so that the level of substances, constituents and total dissolved solids remaining in the industrial discharge from the Property did not exceed the standards of the source water that would be processed at the City's surface water treatment plant, and a raw water line to deliver the treated industrial discharge to the City's surface water treatment plant to be used as a source for potable water. Until the raw water line was constructed, Owner was allowed to discharge the industrial discharge water from the Phase One Development through an Existing Transmission Line to the City's wastewater treatment plant.

I. WHEREAS, Owner subsequently abandoned plans to deliver treated industrial discharge to the City's surface water treatment plant to be used as a source for potable water and to deliver the industrial waste through a dedicated raw water line, which triggered Owner's obligation to remit a Water Resources Fees as described in the Agreement.

J. WHEREAS, under the terms of the Agreement, Owner was temporarily allowed to discharge no more than 500,000 gallons per day of CWD (as defined below) generated by the Phase One Development and the Phase Two Development into an Existing Transmission Line (as defined below) to be delivered to the 157th Ave WWTP with the CWD having a maximum amount of TDS of 1400 mg/L and Owner was to construct Storage Improvements and a Discharge Control System, as both are described in the Agreement, to ensure that no more than 500,000 gpd was discharged into the Existing Transmission Line. The improvements described herein were to be completed prior to the issuance of a Temporary Certificate of Occupancy or Permanent Certificate of Occupancy for the Phase Two Development.

K. WHEREAS, the Phase Two Development is almost complete, but Owner did not construct improvements that would limit the level of TDS in the CWD from the Phase Two Development that would be discharged into the Existing Transmission Line to the 157th Ave. WWTP to 1400 mg/L nor did they construct the Discharge Control System or Storage

Improvements, all of which were conditions of temporary certificates of occupancy and permanent certificates of occupancy being issued for the Phase Two Development.

L. WHEREAS, Owner has determined that if the maximum amount of TDS allowed in the CWD is increased to 2853 mg/L, the CWD generated by the operations of the Phase One Development and the Phase Two Development will not exceed the 500,000 gallons per day limit eliminating the need for the Discharge Control System and Storage Improvements for the Phase Two Development and has asked the City to modify the requirements for obtaining a certificate of occupancy for the Phase Two Development.

M. WHEREAS, under the terms of the Agreement, City must expressly approve of any building permits to be issued on the Property other than the building permits for the Phase One and Phase Two Developments.

N. WHEREAS, the Owner has filed a Development Application for a site plan that contemplates the development of the Phase Three Development (as defined herein), and Owner desires to obtain building permits for the same.

O. WHEREAS, the Owner desires to amend the Agreement, to set forth the conditions and requirements for the City's issuance of building permits, temporary certificates of occupancy, and certificates of occupancy for the Phase Two Development, and to set forth the terms and conditions to for the City's issuance of building permits, temporary certificates of occupancy, and certificates of occupancy for the Phase Three Development on the Property while the City and Owner work to together to identify the utility infrastructure improvements that will be required for the long term operation of the buildings on the Property.

P. WHEREAS, the City acknowledges the development of the Property is consistent with the City's general plan.

Q. WHEREAS, Owner and the City intend this Third Amendment to be a Development Agreement within the meaning of A.R.S. § 9-500.05 that binds Owner and all future owners of all or any portion of the Property.

AGREEMENT

NOW, THEREFORE, in consideration of the mutual obligations contained herein, and for other good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the Parties agree as follows:

1. **INCORPORATION OF RECITALS.** The Parties hereby adopt and incorporate, as if fully set forth herein, the Recitals stated above.

2. **DEFINED TERMS.** All capitalized terms used but not defined in this Third Amendment shall have the meanings ascribed to such terms in the Agreement.

3. **EFFECTIVE DATE.** The execution of this Third Amendment by the Parties and approval of this Third Amendment by Resolution of the Goodyear City Council are conditions precedent to this Third Amendment becoming effective. This Third Amendment shall take effect upon the later of dates each of the following conditions precedent have occurred: (i) the full execution of this Third Amendment by the Parties and (ii) the date the Resolution approving this Third Amendment becomes effective, such later date hereafter defined as the "Third Amendment Effective Date."

4. **AMENDMENTS TO SECTION 2.** Section 2 of the Agreement is hereby amended to amend and add definitions to Section 2 of the Agreement as follows:

The following definitions in Section 2 of the Agreement are amended to read as follows:

2.7 "Carollo Study" and "Updated Carollo Study" mean the work prepared pursuant to a contract between the City of Goodyear and Carollo Engineers, Inc. or between Owner and any other engineering firm approved by the City that will be used to assist in the determination by the City of Necessary Utility Infrastructure Improvements.

2.11 "Full Build-Out" means the maximum number of buildings that can be developed on the Property with no more than three (3) buildings that will use direct evaporative cooling (water cooled), with all other buildings on the Property using air-cooled chillers (non-water cooled).

2.25 "Water Resources Fee" means the cost the City incurs in securing additional Water Resources (i.e. renewable supplies that satisfy the requirements of the Arizona Department of Water Resources to increase the City's water portfolio in its Designation of Assured Water Supply) in an amount equivalent to the amount of the annual water demand needed to serve all development within the Property at Full Build-Out as determined by the Updated Carollo Study described below, in excess of the Type 1 Grandfathered Non-Irrigation water right owned by Owner.

The following definitions are added to Section 2 of the Agreement:

2.26 "157th Ave. WWTP" means the 157th Avenue Wastewater Treatment Plant owned and operated by the City.

2.27 "CWD" means the clear water discharge (also referred to industrial discharge) generated by the cooling operations generated by the operations of the Phase One Development, the Phase Two Development and the Phase Three Development, which will use direct evaporative cooling in their operations.

2.28 "Dedicated Discharge Line" means a transmission line, which will be owned and operated by the City, from the Property to a discharge point near the 157th Ave. WWTP, as approved by the City Engineer or designee, that will accept and delivery all CWD generated by the operations within the Property at Full Build-Out.

2.29 “Existing Transmission Line” means the sewer line within Broadway Road that runs from approximately Litchfield Road to the 157th Ave. WWTP.

2.30 “Evaporation Ponds” means one or more lined holding ponds for the purpose of minimizing the volume of CWD and/or reverse osmosis concentrate brine (“ROC”) by evaporation.

2.31 “On-Site Storage Facilities” means facilities constructed or installed within the Property pursuant to engineering plans approved by the City Engineer or designee that will hold CWD Owner is required to retain on-site and which may include Evaporation Ponds or tanks.

2.32 “Phase Three Development” means the construction of one building that is approximately 250,000 square feet within the Property.

2.33 “WWTP Expansion” means the expansion of the 157th Ave. WWTP by the City to create a minimum of 3 mgd of additional treatment capacity.

5. **AMENDMENT TO SECTION 5.** Section 5 of the Agreement and all subsections therein are deleted in its entirety and replaced with the following:

5. OWNER’S OBLIGATIONS. The following obligations apply to the development of the Property:

5.1 **OPERATIONAL LIMITATIONS.** Owner agrees that the City’s obligation to serve up to 5 MGD of water to serve the Property is limited to the use of the Property solely for the operation of data centers and ancillary uses on the Property, and that should the Property be used for any other purpose, the City’s commitment to provide water to the Property is limited to the unit demand for the applicable usage class as reflected in the City of Goodyear Integrated Water Master Plan in effect at the time of development. Owner further agrees that only the Phase One Development, the Phase Two Development and the Phase Three Development will use direct evaporative cooling (water cooled), and all additional buildings developed on the Property will use air-cooled chillers (non-water cooled).

5.2 **UTILITY SERVICE GENERAL TERMS.** As a condition of the City providing water related services to the Property and subject to the terms and conditions set forth herein, Owner agrees to obtain all wastewater services, which shall include industrial discharge, from the City, and except as otherwise provided herein, all CWD generated by operations within the Property shall be delivered to the 157th Ave. WWTP. All CWD delivered to the 157th Ave. WWTP shall comply with all applicable federal, state, county and local requirements, including the state’s industrial conservation requirements, and, except as provided in the Temporary Solution described in below, all CWD delivered to the 157th Ave. WWTP shall have a maximum level of TDS of the greater of 1400 mg/L or double

the concentration of TDS in the water delivered to the Property (the “CWD Quality Standards”).

5.2.1 All domestic sewage generated from all operations on the Property shall be delivered to the 157th Ave. WWTP through the Existing Transmission Line; and, after the Dedicated Discharge Line has been completed, all CWD delivered to the 157th Ave. WWTP shall be delivered through the Dedicated Discharge Line.

5.2.2 For as long as Owner discharges CWD into the 157th Ave. WWTP, Owner shall, in accordance with the provisions of Chapter 12(A) (Sewer Pretreatment) of the Goodyear City Code, obtain and maintain a wastewater discharge permit issued by the City for the discharge of CWD to the 157th Ave. WWTP. and comply with the terms of such permit.

5.2.2 In the event that the TDS level of the CWD exceeds the maximum levels set forth herein, on more than five (5) days within any 12-month rolling period (“High TDS Event”), the City may, without liability to the City, elect to: (a) temporarily terminate water service to the Property, (b) temporarily withhold any pending building permits for additional buildings on the Property (c) withhold certificates of completion, temporary certificates of occupancy and/or permanent certificates of completion, and/or require Owner to identify and construct infrastructure improvements that will eliminate future High TDS Events. The termination of water service to the Property shall be a last result employed only in the following situations: (a) there have been multiple High TDS Events; (b) continued High TDS Events will continue to occur because of the time it would take Owner to complete remedial actions needed to ensure that future High TDS Events will not occur; and (c) Owner has failed to timely complete infrastructure improvements identified as being needed to ensure that future High TDS Events will not occur. City and Owner agree to reasonably cooperate and work in good faith to agree upon and implement reasonable procedures or requirements necessary to avoid additional High TDS Events, to restore water service to the buildings on the Property where service has been temporarily terminated, and to allow for the issuance of any withheld building permits, certificates of completion, temporary certificates of occupancy and certificates of occupancy.

5.3 OWNER’S GENERAL INFRASTRUCTURE OBLIGATIONS. As a condition of the City providing water and wastewater services to the Property, Owner agrees as follows. Owner shall be responsible for constructing and operating, at Owner’s sole cost, all facilities and improvements, including on-site treatment and storage facilities as may be needed for Owner to comply with applicable federal, state, county, local requirements, including the state’s industrial conservation requirements, and to ensure that the maximum level of

TDS in CWD delivered to the 157th Ave. WWTP do not exceed the maximum levels of TDS set forth in this Agreement. Owner shall either design and construct, at Owner's sole cost, all Necessary Utility Infrastructure Improvements or make an in-lieu payment, if required by the City Engineer or his designee for the cost of such Necessary Utility Infrastructure Improvements. In addition, Owner shall, at Owner's sole cost, acquire and convey to the City easements and/or right-of-way needed for such Necessary Utility Infrastructure Improvements.

5.4 DEVELOPMENT REGULATIONS. Except as otherwise expressly provided in this Agreement or in any other written agreement between the City and Owner and subject to the terms and conditions of this Agreement, the Parties agree that the development of the Property shall be governed by the Development Regulations in effect when the specific Development Application is approved. For example, future applications for rezoning, future site plans, future plats, construction permits, and/or building permits shall be subject to the Development Regulations in effect when the Development Application is approved.

5.5 REQUIREMENTS NOT ADDRESSED. The Parties acknowledge and agree that this Agreement addresses only certain issues with respect to the development of the Property and provides only those rights expressly set forth in this Agreement. Except as expressly provided otherwise in this Agreement, this Agreement does not relieve Owner from complying with the City's requirements concerning the development process, including by way of example but not limitation, complying with procedures and processes governing submission requirements for zoning, preliminary subdivision plats, final subdivision plats and/or site plans, and paying all applicable costs, permit fees, development fees, application fees, and taxes.

5.6 FUTURE CONDITIONS AND APPROVALS. The Parties acknowledge and agree that this Agreement addresses only limited issues relative to the development of the Property and that the Agreement does not limit or preclude the City from imposing additional restrictions, requirements, contributions, conditions or the like for the development of the remaining portion of Property that may be allowed by law and consistent with the Development Regulations, unless expressly addressed herein. The Parties agree that nothing in this Agreement shall be deemed to require the City to grant any future administrative or legislative approvals related to the development of the Property that would be in addition to those approvals the City has already provided to the Property provided, however, such approvals have not already expired or been terminated, do not expire or terminate pursuant to the terms of this Agreement, or are not revoked or terminated because of a breach of this Agreement. Regardless of whether the action or payment is provided for in this Agreement, the Parties acknowledge and agree that the City is not required to undertake any action or make any payments if any federal, state, or local law requires formal action and approval by the City Council before undertaking such action or payment until the City Council has taken the required formal action and has approved the action or

payment. The Parties agree that nothing in this Agreement shall affect the City's legislative authority to approve or deny zoning or other development related applications, including applications for preliminary and/or final plats and/or site plans, or the City's legislative authority to impose conditions on the development of the Property. Finally, the Parties agree that except as otherwise expressly provided herein, nothing in this Agreement shall restrict the Owner's rights to object to and pursue all legal remedies to obtain relief from any future conditions, stipulations, policies, procedures, resolutions or ordinances imposed by the City that Owner deems are illegal and/or beyond the scope of the City's statutory authority as applied to the Property, or from filing any future entitlements-related application, pursuing any process, or seeking any interpretation, determination, or decision, administrative, quasi-judicial, legislative, or otherwise, affecting the development of the Property related to future conditions, stipulations policies procedures, resolutions or ordinances, including but not limited to variances, interpretation requests, and/or appeals of City-decisions with respect to matters relating to the development of the Property.

5.7 DEVELOPMENT IMPACT FEES. Except as expressly provided herein, nothing in this Agreement is intended to relieve Owner of paying all applicable development impact fees, including water and wastewater impact fees, and Owner shall pay all applicable development impact fees when they become due in the development process.

5.8 WATER RESOURCE FEE. Owner shall not be responsible for the payment of Water Resources Fees provided Owner develops the Property such that Owner's facilities return to the City, in the form of industrial discharge, fifty percent (50%) of the potable water delivered to the Property treated to a level that the treated industrial discharge could be used as a raw water source to be delivered and processed at the City's surface water treatment plant. Should Owner's plans change such that the City will not be receiving, in the form of industrial discharge, fifty percent (50%) of the potable water delivered to the Property treated to a level that the treated industrial discharge could be used as a raw water source, Owner shall be responsible for payment to the City of Water Resources Fees, the cost of which will be determined and assessed when additional water supplies are requested.

6. AMENDMENT TO SECTION 6. Section 6 of the Agreement and all subsections therein are deleted in its entirety and replaced with the following:

6. WATER AND WASTEWATER INFRASTRUCTURE. As set forth in section 5 above, Owner is required to either design and construct, at Owner's sole cost, all Necessary Utility Infrastructure Improvements or, if required by the City Engineer or

designee, make an in-lieu payment for the cost of such Necessary Utility Infrastructure Improvements.

6.1 Phase One Development. The following infrastructure improvements have been determined to be Necessary Utility Infrastructure Improvements for the development of the Phase One Development are as follows:

6.1.1 a new 16-inch water line within the Litchfield Road right-of-way that connects to an existing 12-inch water line located approximately 850 feet south of Lower Buckeye Road and that extends south to Broadway Road right-of-way and those appurtenances as may be required by applicable Development Regulations (the "Litchfield Water Line"); and

6.1.2 a new 16-inch water line within the Broadway Road right-of-way that connects to the Litchfield Water Line at Litchfield Road and extends west to Bullard Avenue right-of-way, connecting to the existing 12-inch water line within Bullard Avenue and those appurtenances as may be required by applicable Development Regulations (the "Broadway Water Line"); and

6.1.3 a new 16-inch water line along the western boundary of the Property that connects to the Broadway Water Line and extends north to West El Sol connecting the existing 12-inch water lines within West El Sol and South La Cometa and those appurtenances as may be required by applicable Development Regulations (the "La Cometa Water Line").

6.1.4 a new 12-inch gravity sewer line within the Broadway Road right-of-way adjacent to the entire southern boundary of the Property and appurtenance as may be required by applicable Development Regulations (the "12-Inch Broadway Sewer Line"); and

6.1.5 a new 15-inch gravity sewer line within the Broadway Road right-of-way that connects to the 12-Inch Broadway Sewer Line and extends west to Bullard Avenue connecting to the existing 12-inch sewer line within Bullard Avenue and the existing 15-inch sewer line within Broadway Road and appurtenance as may be required by applicable Development Regulations (the "15-Inch Broadway Sewer Line"); and

6.1.6 The obligation to construct the foregoing includes the construction of any other Additional Required Phase One Infrastructure improvements that may be required because of the construction of the foregoing infrastructure improvements. This includes by way of example, the construction of all improvements required to cure any conflicts that may arise because of the construction of the foregoing, such as the need to relocate existing utility lines or existing drainage facilities.

6.2 Phase Two Development. The Temporary Solution discussed below identifies the infrastructure improvements required for the Phase Two Development.

6.3 Phase Three Development. Owner is seeking a permit for the Phase Three Development prior to the completion of an update to the Carollo Study and at a time when there is no capacity at the 157th Ave. WWTP to accept discharges from the Property to the 157th Ave. WWTP in excess of 500,000 gpd until the WWTP Expansion is completed. Accordingly, the following terms and conditions shall apply with respect to the Phase Three Development.

6.3.1 All CWD generated from all development within the Property at Full Build-Out in excess of 500,000 gpd, which includes CWD generated by the operations of the Phase Three Development, shall be stored on the Property until such time as the WWTP expansion has been completed and additional treatment capacity is available to accept additional flows from the Property. Following the completion of the WWTP Expansion, all CWD generated from all development within the Property at Full Build-Out shall be delivered to the 157th Ave. WWTP through the Dedicated Discharge Line and the domestic sewage shall be delivered to the 157th Ave. WWTP through the Existing Transmission Line.

6.3.2 On or before August 31, 2024, Owner shall have submitted to and received the approval of the City an Updated Carollo Study that complies with the requirements set forth in the Carollo Study Update Scope of Work attached hereto as Exhibit 2. No temporary certificates of occupancy or permanent certificates of occupancy shall be issued for the Phase Three Development until the updated study referred to herein is completed and approved by the City Engineer or designee.

6.3.3 Prior to the issuance of a building permit for the Phase Three Development, Owner shall make an in-lieu payment of thirty-six million dollars (\$36,000,000), which represents an estimated cost on a per gallon basis for the treatment capacity required to treat all CWD generated from the operations on the Property at Full Build-Out (the "In-Lieu Payment for WWTP Expansion"). The payment is based on the \$90,000,000 the City has programmed for the expansion of the 157th Ave. WWTP which will generate an additional 3,000,000 gallons per day of treatment capacity and the estimated treatment capacity needed to serve the Property at Full Build-Out of 1,200,000 gpd. If the actual cost of the expansion, on a per gallon per day basis, exceeds the amount paid and/or if the amount of treatment capacity needed to serve the Property at Full Build-Out, as determined by the Updated Carollo Study that complies with the requirements set forth in the Carollo Study Update Scope of Work attached hereto as Exhibit 2, Owner agrees to remit to the City the difference between what was paid and what was owed. If the actual cost of the expansion, on a per gallon per day

basis, is less than the amount paid and/or the amount of treatment capacity needed to serve the Property at Full Build-Out is less than 1,200,000 gpd, the City agrees to reimburse Owner the difference between what was paid and what was owed. Following the completion of the expansion of the 157th Ave. WWTP, the City agrees to provide wastewater services to the Property in the amount of the capacity attributable to the in-lieu payment provided herein. For example, if Owner made an in-lieu payment to cover the cost of 1.2 mgd of treatment capacity, the City will accept up to 1.2 mgd of CWD from the Property. The City shall not charge the portion of wastewater development impact fees attributable to the 157th Ave. WWTP and following the City's receipt of the in-lieu payment described herein, the City shall reimburse Owner for the portion of any wastewater development impact fee collected for development within the Property attributable to the 157th Ave. WWTP. If an additional payment is owed hereunder, the City shall be entitled to withhold future building permits, certificates of completion, temporary certificates of occupancy and certificates of occupancy requested for future development on the Property. Upon completion the WWTP Expansion and the City's receipt of the payment as it may be adjusted referred to herein, the treatment capacity for which Owner paid shall be available to serve the Property. For example, if it is determined that the treatment capacity needed to serve the Property at Full Build-Out is 1,200,000 and Owner made the payment, as it may be adjusted, described herein, Owner shall be entitled to deliver up to 1,200,000 of CWD and domestic sewage to the 157 Ave. WWTP following the completion of the WWTP Expansion.

6.3.4 Prior to the issuance of a building permit for the Phase Three Development, Owner shall deposit with the City a cash deposit of \$5,000,000 for the estimated costs of the Dedicated Discharge Line and water lines needed to deliver the maximum peak daily water supply needed for all development within the Property at Full Build-Out (the "Financial Assurance Deposit"). Because the updated study referred to herein will not have been completed, the deposit required herein is based on a very rough estimate by the City Engineer or designee of the costs of installing 12,000 linear feet of sewer line for the Dedicated Discharge Line and 6,000 linear feet of water lines staff anticipates will be needed for the delivery of the maximum peak daily water supply needed to serve all development within the Property at Full Build-Out. Following the completion of the updated study and prior to the issuance of any permits for the construction of the Dedicated Discharge Line and the water lines, Owner shall obtain an engineer's estimate of the costs of constructing the Dedicated Discharge Lines and the water lines identified in the updated study required to deliver the maximum peak daily water supply needed to serve all development within the Property at Full Build-Out; and, upon approval of the engineer's estimate by the City Engineer or designee, the Parties shall establish an escrow funded by the deposits paid to the City and any additional amounts

needed to make up the difference between the engineer's estimate of the improvements and the deposits, which are to be funded by the Owner. The escrow shall allow Owner, subject to the approval of the City Engineer or designee, to draw upon the funds to pay for the construction of such improvements.

6.3.5 Prior to the issuance of a building permit for the Phase Three Development, Owner shall deposit with the City a cash deposit of \$800,000 for the estimated costs the City will incur pursuant to contract(s) the City will enter to retain the services of the Designated Representative for a two-year period as described below. The City will use the \$800,000 to pay the costs incurred under such contract(s), and at the end of the two-years, the City will either return the portion of the \$800,000 deposit not used to pay for the services of the Designated Representative, if any remains or invoice Owner for the costs the City incurs under the contract(s) entered for the services of the Designated Representative in excess of the \$800,000 deposit, which Owner shall pay with 45 days of the date of the invoice.

6.3.6 By August 31, 2024, Owner, at Owner's sole cost, shall have completed the construction of the Dedicated Discharge Line and the improvements needed so that CWD from the Phase One Development and Phase Two Development, up to a maximum of 500,000 gallons per day, can be delivered to the 157th Ave. WWTP through the Dedicated Discharge Line identified in the updated study. No certificate of completion, temporary certificate of occupancy or permanent certificate of occupancy shall be issued for the Phase Three Development until the Dedicated Discharge Line has been completed and accepted by the City Engineer or designee, subject to completion of the two-year warranty period.

6.3.7 Owner shall complete all improvements identified in the Updated Carollo Study as needed to isolate the CWD from domestic sewage so that all CWD generated from the operations of the Phase One Development, the Phase Two Development and the Phase Three Development will be conveyed to the 157th Ave. WWTP through the Dedicated Discharge Line and all domestic sewage generated from the operations of the Phase One Development, the Phase Two Development and the Phase Three Development will be conveyed to the 157 Ave. WWTP through the Existing Transmission Line. No certificate of completion, temporary certificate of occupancy or permanent certificate of occupancy shall be issued for the Phase Three Development until the improvements described herein have been completed.

6.3.8 Owner shall complete the construction of all water lines identified in the Updated Carollo Study as being needed to deliver the maximum peak daily water supply for all development within the Property at Full Build-Out to the Property. No certificate of completion, temporary certificate of

occupancy or permanent certificate of occupancy shall be issued for the Phase Three Development until the water lines identified in the Updated Carollo Study have been completed and accepted by the City Engineer or designee, subject to completion of the two-year warranty period.

6.3.9 Prior to issuance of a certificate of completion, a temporary certificate of occupancy or a permanent certificate of occupancy for the Phase Three Development Owner, shall have completed the construction of all On-Site Storage Facilities identified in the Updated Carollo Study that will be needed to store CWD that will be generated by all development within the Property at Full Build-Out in excess of 500,000 gpd until WWTP Expansion has been completed.

6.3.9.1 If the On-Site Storage Facilities referred to above include Evaporation Ponds, the design and construction of the Evaporation ponds shall comply with all applicable Development Regulations and the design and construction of the Evaporation Ponds on the Property, including compliance with all Development Regulations. Further, Owner's design, construction, and operation of the Evaporation Ponds shall be consistent with and meet the requirements set forth in that Wildlife Hazard Management Plan for PHX12-14 Data Center Evaporation Ponds, dated November, 2022, by Jacobs, and approved by the City of Goodyear on December 22, 2022, a copy of which is attached hereto as Exhibit 3. The failure to comply with such requirements shall be considered a breach of this Agreement and the City, shall be entitled, in addition to all other remedies available to it under the law and equity, to withhold building permits for future development within the Property until assurances have been provided by Owner that Owner has cured any breach and has taken measures to insure future compliance with the requirements of the Phoenix/Goodyear Airport.

6.3.9.2 The design, construction, and operation of the Evaporation Ponds may be modified by Owner so long as the final designs for the same are approved by the City Engineer or Designee and the Phoenix/Goodyear Airport and are otherwise in compliance with the requirements of the Agreement.

6.3.10 Prior to issuance of a certificate of completion, a temporary certificate of occupancy or a permanent certificate of occupancy for the Phase Three Development Owner shall have completed all on-site improvements identified in the Updated Carollo Study as being needed to meet applicable CWD Quality Standards.

6.3.11 Prior to issuance of a certificate of completion, a temporary certificate of occupancy or a permanent certificate of occupancy for the Phase Three Development Owner shall have completed all improvements identified in the Updated Carollo Study as being needed so that all CWD from the Phase One Development and Phase Two Development and Phase Three Development can be delivered to the 157th Ave. WWTP through the Dedicated Discharge Line.

6.3.12 Prior to the issuance of a certificate of completion, a temporary certificate of occupancy or a permanent certificate of occupancy for the Phase Three Development, Owner shall remit to the City a Water Resources Fee if the updated Carollo Study determines that the annual water demand for all development within the Property at Full-Build-Out exceeds the Type 1 Grandfathered Non-Irrigation Right owned by Owner.

6.3.13 Prior to the issuance of a certificate of completion, a temporary certificate of occupancy or a permanent certificate of occupancy for the Phase Three Development Owner, the berming and landscaping mitigation on the east and west property lines of the Property, as shown on the PHX10-11 Sight Visibility and Mitigation exhibit dated November 18, 2018 and attached to the PAD Overlay, shall be extended from the limits of the berming and landscaping mitigation installed by Owner with the Phoenix One Development and the Phoenix Two Development, to a distance of 100 feet north of the northern boundary of the Property.

6.3.14 Upon completion of the expansion of the 157th Ave. WWTP The City shall deliver written notice to Owner (the "City Completion Notice") that the City has completed the expansion of the 157th Ave. WWTP such that the City has sufficient capacity to receive the CWD from the Phase One Development, the Phase Two Development, and the Phase Three Development. Within ninety (90) days following receipt of the City Completion Notice, Owner shall begin discharging all CWD generated from the operations of the Phase One Development, the Phase Two Development, and the Phase Three Development to the 157th Ave. WWTP through the Dedicated Discharge Line. All CWD discharges shall comply with all applicable federal, state, county and local requirements, including the state's industrial conservation requirements, for discharges of wastewater, and the level of TDS in the CWD being delivered to the 157th Ave. WWTP shall not exceed the higher of 1,400 mg/L or double the TDS level of the incoming water from the City.

6.4 TEMPORARY SOLUTION. Subject to the terms and conditions set forth herein in this Section 6.4 and all subsections herein, the City agrees that the following temporary solution for the disposal of CWD generated from the operations of the Phase One Development, the Phase Two Development and the Phase Three Development shall apply to discharges of CWD generated from the

operations of the Phase One Development, the Phase Two Development, and the Phase Three Development until the WWTP Expansion has been completed.

6.4.1 Until August 31, 2024 or the date the Dedicated Discharge Line is completed, whichever is earlier, Owner shall be entitled to deliver no more than 500,000 gallons per day of CWD generated from the operations of the Phase One Development and the Phase Two Development and the Phase Three Development through the Existing Transmission Line to the 157th Ave. WWTP.

6.4.2 Upon completion of the Dedicated Discharge Line, all discharges of CWD to the 157th Ave. WWTP allowed in this Section 6.4 and all subsections therein shall be delivered through the Dedicated Discharge Line.

6.4.3 All CWD delivered to the 157th Ave. WWTP shall comply with all applicable federal, state, county and local requirements, including the state's industrial conservation requirements, for discharges of wastewater and with the terms of the wastewater discharge permit issued to Owner by the City; and until the WWTP Expansion has been completed, the maximum TDS in the CWD that may be delivered to the 157th Ave. WWTP is temporarily increased to 2853 mg/L.

6.4.4 Owner will install one or more flow meters on the Property, monitor instantaneous and aggregate daily flows of discharge from the Phase One Development and the Phase Two Development. The City will install its own flow meter at a location outside of Microsoft's improvements in order to provide the City real-time electronic access to the instantaneous and aggregate daily flows of discharge from the Phase One Development, the Phase Two Development, and the Phase Three Development. Microsoft agrees to reimburse the City for the reasonable costs and expenses actually incurred to install the City's flow meter.

6.4.5 Upon completion of the WWTP Expansion, the maximum level of TDS in the CWD delivered to the 157th Ave. WWTP shall be limited to the greater of 1400 mg/L or double the concentration of TDS in the water delivered to the Property.

6.4.6 If the Dedicated Discharge Line is not completed by August 31, 2024 or if the improvements needed for CWD generated from the Operations of the Phase One Development, the Phase Two Development and/or the Phase Three Development to be discharged to the Dedicated Discharge Line by August 31, 2024, Owner shall not be allowed to deliver CWD generated from the operations of the Phase One Development, the Phase Two Development, and the Phase Three Development through the Existing Transmission Line. Instead, Owner shall be required to store all

CWD generated from the operations of the Phase One Development, the Phase Two Development, and the Phase Three Development in On-Site Storage Facilities located within the Property; and the City shall be entitled to take all actions, without liability to the City, to ensure that no CWD from the Phase One Development, the Phase Two Development and/or the Phase Three Development enters the Existing Transmission Line.

6.4.7 In the event that Owner's industrial discharge from the Phase One Development, the Phase Two Development and the Phase Three Development in aggregate, exceeds 500,000 gallons per day (a "Discharge Overflow Event"), the following will apply: (a) Owner will pay the City the sum of \$5,000 per day on which any Discharge Overflow Event occurs; (b) Owner will reimburse the City for the actual costs incurred to remediate each Discharge Overflow Event; (c) Owner will protect, defend, indemnify and hold harmless the City, its elected officials, directors, managers, employees, representatives, and agents against any and all third party claims that may be asserted against the City directly caused by the occurrence of a Discharge Overflow Event; and (d) Owner will reimburse the City for any regulatory fines paid by the City for each Discharge Overflow Event.

6.4.8 In the event that Owner discharges CWD to the 157th Ave. WWTP through the Existing Transmission line after either the Dedicated Discharge Line is complete or after August 31, 2024 ("Discharge Violation"), the following applies: (a) Owner shall pay the City the sum of \$10,000 per day on which any Discharge Violation occurs; (b) Owner shall reimburse the City for the actual costs incurred to remediate each Discharge Violation; and (c) Owner will protect, defend, indemnify and hold harmless the City, its elected officials, directors, managers, employees, representatives, and agents against any and all third party claims that may be asserted against the City directly caused by the occurrence of a Discharge Violation. In addition, if the Discharge Violation continues for more than five days, the City shall be entitled, without liability to the City, to terminate delivery of water supplies to the Property.

7. **AMENDMENT TO SECTION 8.** Section 8 of the Agreement and all subsections therein are deleted in its entirety and replaced with the following: *RESERVED*

8. **AMENDMENT TO SECTION 9.** Section 9 of the Agreement (Limitation on Phase One Infrastructure) is amended as follows: The reference to Section 8 is hereby deleted.

9. **AMENDMENT TO SECTION 12.** Section 12 of the Agreement (Owner's Obligation for Phase One Improvements) is amended as follows: The reference to Section 8 is hereby deleted.

10. **AMENDMENT TO SECTION 13.** Section 13 of the Agreement (Condemnation) is amended as follows: The reference to Section 5.2 is replaced with Section 5.3.

11. **AMENDMENT TO SECTION 13.2.** Section 13.2 of the Agreement is hereby deleted in its entirety and replaced with the following:

13.2 The City shall not be required to exercise its power of eminent domain to acquire easements for the water and/or sewer lines Owner is required to construct if such lines can physically be located within existing City right-of-way, some other governmental owned and/or controlled right-of-way, and/or easements within the Property but Owner chooses to locate the lines elsewhere. In such cases, Owner shall be responsible for acquiring, and conveying to the City, at no cost to the City, easements, in a form acceptable to the Goodyear City Attorney or his designee, as may be needed for the water and sewer lines Owner is required to construct. Such easements shall be in a location acceptable to the City Engineer or designee.

12. **AMENDMENT TO SECTION 16.2.** Section 16.2 of the Agreement is hereby deleted in its entirety and replaced with the following:

16.2 No building permits, shall be issued for future buildings on the Property following the issuance of a building permit for the Phase Three Development as provided herein, until all of the following have occurred: (a) the City has identified the Additional Necessary Utility Infrastructure Improvements required for the City to provide water service and wastewater service, including the disposal of industrial discharge, to the structures for which the building permits are being sought and (b) the City and Owner have entered into an amendment of this Agreement or a new agreement that, at a minimum, includes: the terms identified in Section 19 of this Agreement; identifies the Additional Necessary Utility Infrastructure Improvements Owner is required to purchase, design construct and install or cause to be purchased, designed, constructed and installed for the City to provide water service and wastewater, including the disposal of industrial discharge to the structure(s) for which the building permit(s) are being sought, that addresses the timing for the completion of such infrastructure; (c) all of the requirements that have to be satisfied for a certificate of completion, temporary certificate of occupancy and a permanent certificate of occupancy for the Phase Three Development have been satisfied, which includes by way of example, but not limitation, satisfaction of all of the requirements set forth in Section 6.3 and all subsections therein as it has been amended by this Third Amendment.

16.2.1 Subject to compliance with all applicable Development Regulations, City agrees to issue all appropriate building permits for the Phase Three Development upon approval of the Development Application for the same and satisfaction of the following conditions: (a) the City's receipt of the in-lieu payment described in Section 6.3.3, the In-Lieu Payment for WWTP Expansion; (b) the City's receipt of the deposit described in Section 6.3.4 (the "Financial Assurance Deposit") and (c) the City's receipt of the deposit described in Section 6.3.5 (the "Designated Representative Deposit").

13. AMENDMENT TO SECTION 16.3. Section 16.3 of the Agreement is hereby deleted in its entirety and replaced with the following:

16.3 No certificates of completion and/or certificates of occupancy shall be issued for any other structure on the Property unless the City Engineer has determined that all of the On-Site and Off-Site infrastructure needed for the City to provide water service, and wastewater service to the structures for which the certificate of completion and/or certificate of occupancy is being sought has been completed. All Off-site infrastructure improvements shall be dedicated to the City and accepted by the City upon completion, and shall be considered complete when the City Engineer has accepted the improvements. Owner shall warrant the infrastructure improvements for two (2) years following the City's acceptance as set forth in the City's Engineering Design Standards and Policies Manual.

16.3.1 Certificates of completion, temporary certificates of occupancy and/or permanent certificates of occupancy shall be issued for the Phase One Development upon satisfaction of all Development Regulations applicable to the Phase One Development and of all applicable requirements in the Agreement as amended.

16.3.2 Certificates of completion, temporary certificates of occupancy and/or permanent certificates of occupancy shall be issued for the Phase Two Development upon satisfaction of all Development Regulations applicable to the Phase Two Development and of all applicable requirements in the Agreement as amended.

16.3.3 Certificates of completion, temporary certificates of occupancy and/or permanent certificates of occupancy shall be issued for the Phase 3 Development Agreement upon satisfaction of all Development Regulations applicable to the Phase Three Development and of all applicable requirements in the Agreement as amended. This includes by way of example, but not limitation, satisfaction of all of the requirements set forth in Section 6.3 and all subsections therein as it has been amended by this Third Amendment.

14. AMENDMENT TO SECTION 17. Section 17 of the Agreement is hereby amended as follows: The reference to Phase One Development is replaced with the Property.

15. AMENDMENT TO SECTION 17.5. Section 17.5 of the Agreement is hereby amended as follows: The reference to Phase One Development is replaced with the Property.

16. AMENDMENT TO SECTION 17.8.3. Section 17.8.3 of the Agreement is hereby amended as follows: The reference to Phase One Development is replaced with the Property.

17.8.3 Owner and City agree that the current commercial large water usage rate of \$10.19 per thousand gallons adopted by the Goodyear City Council is a reasonable approximation

of the shared costs and reimbursement of the additional services the City will provide under the Well Sharing and/or Water Wheeling Agreements that will be entered into hereunder and associated services and the Owner and City agreement that the costs and fees payable by Owner under the Well Sharing and/or Water Wheeling Agreement entered into hereunder shall be the calculated in accordance with such rate and shall provide for an annual adjustment based on the percentage increase in the water and sewer maintenance category of the Consumer Price Index for all Urban Consumers (CPI-U) U.S. City average published by the Bureau of Labor Statistics. The City shall not impose any additional fees for the delivery of water to the Property other than the water usage rate provided for in this Section and incorporated into the Well Sharing and/or Water Wheeling Agreements to be entered hereunder. The foregoing limitation on additional fees is not intended, nor does it limit the City's ability to charge applicable federal, state, county and/or local taxes.

17. **AMENDMENT TO SECTION 31.** Section 31 of the Agreement is hereby deleted in its entirety and replaced with the following:

31. **DEFAULTS AND REMEDIES AND MEDIATION.** Any Party shall be in default under this Agreement ("Default") if it fails to satisfy any due and owing term or condition as required under this Agreement within thirty (30) business days following written notice from the other Party ("Notice"); provided, however, that the Notice shall set forth the specific reasons for the determination that the Party has failed to satisfy any term of condition hereof. A Party shall not be in Default if the Party commences to cure any deficiencies within thirty (30) business days of receipt of Notice and cures such deficiencies within a reasonable time thereafter.

31.1 If a dispute arises out of or related to this Agreement, or breach thereof, and if the dispute cannot be settled through negotiation, the Parties agree first to try to settle the dispute through mediation before resorting to arbitration, litigation, or some other dispute resolution. In the event that the Parties cannot agree upon the selection of a mediator within seven (7) days, either Party may request a presiding judge of the Superior Court to assign a mediator from a list of mediators maintained by the Arizona Municipal Risk Retention Pool. If the dispute is not resolved within thirty (30) days of from the date a mediator is selected or appointed, the mediation will be deemed to have failed and the obligation hereunder satisfied; provided, however, if the Parties and the agreed upon mediator cannot in good faith schedule a meeting to mediate the dispute within the time stated in the foregoing clause, the period of time state in the foregoing clause shall be extended by an additional thirty (30) days. The terms of this Section 33 shall survive the expiration or earlier termination of this Agreement

18. **AMENDMENT TO SECTION 33.** Section 33 of the Agreement is hereby deleted in its entirety and replaced with the following:

33. **DESIGNATED REPRESENTATIVES.**

The City will enter into one or more contracts for a period of two-year to retain the services

of a person who will serve as the singular point of contact between Owner and City to coordinate and facilitate the development of the Property and the other property Owner is developing within the city known as PHX-70 (the "City Designated Representative"). Communications from Owner to the City regarding the requirements of the Agreement or development related activities shall be directed to the City Designated Representative. The City Designative Representative will be responsible for shepherding Owner's development projects through the City's development process and his or her responsibilities will include, by way of example, scheduling pre-application meetings; providing assistance with pre-submittal and pre-construction meeting; coordinating plan review preparation, development application submittals, and responses to comments to minimize delays in approvals; participating with City staff in the review of site plans, civil construction plans and building plans to understand City staff's concerns and what is required to address such concerns and communicating this information to Owner; coordinating meetings to review City staff concerns; coordinating requests for inspections, attending inspections, and communicating results of inspections to Owner; attending all meetings with outside agencies such as private utility companies, WAPA and Maricopa County Environmental Services Department, communicating the results of those meetings to City and Owner, and coordinating remedial actions, if any, needed to address concerns raised by these agencies; and creating and maintaining records of results of his or her coordination efforts, including taking notes and meeting minutes from all meetings. The City Designated Representative will direct his or her communications about Owner's development projects to the Owner Designated Representative.

Owner shall identify a Designated Representative as the singular point of contact between the City and Owner to coordinate and facilitate the development of the Property and the other property Owner is developing within the city known as PHX-70 (the "Owner Designated Representative"). Owner shall have an Owner Designated Representative during the entire time the City has a City Designated Representative. Communications from Owner to the City regarding the requirements of the Agreement or development related activities shall be made by the Owner Designated Representative. The Owner Designated Representative's responsibilities will include, by way of example, responding to communications from the City's Designated Representative; coordinating the resolution of issues arising during the development process with Owner's development team; and communicating Owner's concerns about the development process and issues that have arisen.

Each Party shall notify the other in writing of the name of their respective Designated Representatives and their contact information. Either Party may change its Designated Representative under this Agreement at any time by written notice to the other party at least ten (10) business days before the change is to take effect.

19. Owner and City agree to amend the Well Sharing and Water Transportation Agreement for PHX 10-11 that Owner and the City entered pursuant to the Agreement as may be needed to conform to the amendments made to Section 17 of the Agreement.

20. Although Owner will be storing certain amounts of CWD on the Property prior to

the completion of the WWTP expansion, Owner agrees to pay the fees for wastewater as if the CWD were being discharged to the 157th Ave. WWTP. The City agrees it will not charge additional fees for the delivery of the CWD stored on the Property to the 157th Ave. WWTP when the stored CWD is delivered to the 157th Ave. WWTP.

GENERAL TERMS

21. **ENTIRE AGREEMENT.** This Third Amendment and the exhibit(s) referred to herein and attached hereto, along with the unchanged provisions in the Agreement constitute the sole and entire agreement between the Parties with respect to the matters covered herein and supersede any prior or contemporaneous agreements, understandings or undertakings, written or oral, by or between the Parties, and/or by or between any of the Parties and any third parties. This Third Amendment shall be deemed to amend and supersede the Agreement with respect to all terms, provisions and changes set forth in this Third Amendment. To the extent of any conflict between this Third Amendment and the Agreement, this Third Amendment shall control. Except as amended by this Third Amendment, all terms, provisions and conditions of the Agreement shall remain in full force and effect.

22. **AMENDMENTS.** The Agreement and this Third Amendment thereto, may not be changed modified or rescinded except in writing as agreed to and signed by the Parties hereto and approved by a Resolution of the Mayor and Council of the City of Goodyear.

23. **SECTION HEADINGS.** The section headings contained in this Third Amendment are for convenience in reference only and are not intended to define or limit the scope of any provision of this Third Amendment.

24. **FAIR INTERPRETATION.** The terms and provisions of this Third Amendment represent the result of negotiations between the Parties, each of which has had the opportunity to consult with counsel of their own choosing and/or has been represented by counsel of their own choosing, and none of whom has acted under any duress or compulsion, whether economic or otherwise. Consequently, the Parties agree the terms and provisions of this Third Amendment shall be construed according to their usual and customary meanings, and the Parties each hereby waive the application of any rule of law (common law or otherwise) that ambiguous or conflicting terms be resolved against the Party who prepared, or whose attorney prepared, the executed Agreement or any earlier draft of same. The terms of this Section 24 shall survive the expiration or earlier termination of the Agreement.

25. **REPRESENTATIONS AND WARRANTIES OF OWNER.** As of the date of the execution of this Third Amendment, Owner represents and warrants the following:

25.1 **OWNERSHIP.** Owner is the owner of the Property and has the full right and authority to submit its interest in the Property to the obligations hereunder. Owner holds title free and clear of all monetary liens other than liens for taxes not yet due and payable.

25.2 **AUTHORIZATION.** Owner is qualified to do business in Arizona and in good standing; Owner (including the person signing for Owner) has the authority and the right to

enter into this Third Amendment as authorized by Owner, and Owner is not prohibited from executing this Third Amendment by any law, rule, regulation, instrument, agreement, order or judgment.

25.3 DUE DILIGENCE. Owner reviewed this Third Amendment and reached its own conclusions as to the binding and enforceable nature thereof and all of the provisions contained therein, and has not relied on any representations or warranties of City other than those expressly provided in this Third Amendment.

26. REPRESENTATIONS AND WARRANTIES OF CITY. As of the Third Amendment Effective Date of this Agreement, the City represents and warrants the following:

26.1 APPROVAL. City has approved this Third Amendment at a duly held and noticed public meeting by its Mayor and City Council, at which a quorum was duly present, and has authorized the execution hereof.

26.2 AUTHORIZATION. City agrees that the persons executing this Third Amendment on behalf of City have been duly authorized to do so, and City is not prohibited from executing this Third Amendment by any law, rule, regulation, instrument, agreement, order or judgment.

27. COUNTERPARTS. This Third Amendment may be executed in two or more counterparts, each of which shall be deemed an original and all of which, taken together, shall constitute one agreement, binding on the Parties. Further this Third Amendment may be executed and delivered by electronic transmission. A manually signed copy of this Third Amendment delivered by facsimile, email, or other means of electronic transmission shall be deemed to have the same legal effect as delivery of an original signed copy of this Third Amendment provided however, Owner shall deliver an original to the City for recordation by the City in the Official Records of Maricopa County.

28. PAGE NUMBERING. The page numbering of this document is exclusive of the Exhibits attached hereto.

IN WITNESS WHEREOF, and agreeing to be bound by the terms of this Third Amendment to Infrastructure Development Agreement for PHX 10-11 the City and Owner have caused this Third Amendment to Infrastructure Development Agreement for PHX 10-11 to be executed by their duly appointed representatives.

Signatures, Acknowledgments and Exhibits on Following Pages

OWNER:

Microsoft Corporation,
a Washington corporation

By: [Signature]

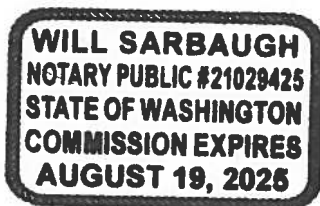
Name: ADITYA DALMIA

Its: CVP

State of Washington)
County of King) ss.

The Third Amendment to Infrastructure Development Agreement for PHX 10-11 by and between Microsoft Corporation, a Washington corporation and the City of Goodyear, an Arizona municipal corporation was acknowledged before me this 27 day of February, 2023, by Aditya Dalmia, the CVP of Microsoft Corporation, a Washington corporation, and who proved to me on the basis of satisfactory evidence to be the person whose name is subscribed to the and acknowledged to me that he being authorized to do so, executed the foregoing instrument for the purposes therein contained on behalf of Microsoft Corporation, a Washington corporation.

[Signature]
Notary Public



Signatures, Acknowledgments and Exhibits Continued on Following Pages

CITY:

CITY OF GOODYEAR, an Arizona municipal corporation

By: _____ Wynette Reed
Its: City Manager

STATE OF ARIZONA)
) ss.
County of Maricopa)

The Third Amendment to Infrastructure Development Agreement for PHX 10-11 by and between Microsoft Corporation, a Washington corporation and the City of Goodyear, an Arizona municipal corporation was acknowledged before me this _____ day of _____, 2023, by Wynette Reed, the City Manager of the CITY OF GOODYEAR, an Arizona municipal corporation, for and on behalf thereof.

Notary Public

Attest:

Darcie McCracken, City Clerk

Approved as to Form:

Roric Massey, City Attorney

Exhibits on Following Pages

Exhibit 1

Exhibit 2

Carollo Study Update Scope of Work

The Carollo Study Update shall:

- All infrastructure and Water Resources determinations shall be based on.
- Determine the annual water demand for all development within the Property at Full Build-Out based on the Phase One, Two, and Three Developments utilizing direct evaporative cooling (water cooled), with the data center buildings developed on the Property following the Phase Three Development utilizing air-cooled chillers (non-water cooled).
- Determine the peak daily water demand for all development within the Property at Full Build-Out (the “Peak Daily Water Demand”).
- Identify all water lines needed to deliver the Peak Daily Water Demand.
- Determine peak daily volume of CWD in gallons per day that will be generated for all development within the Property at Full Build-Out.
- Identify size of a Dedicated Discharge Line needed to transmit the maximum peak daily CWD that will be generated for all development within the Property at Full Build-Out.
- Identify all improvements needed to isolate the industrial discharges from domestic sewage and connect the industrial discharges to the Dedicated Discharge Line.
- Identify any on-site improvements needed to meet Ultimate Wastewater Discharge Requirements, as described below (on-site treatment, storage for blending, etc.).
- Identify all improvements needed so that CWD from the Phase One Development and Phase Two Development, which is currently being delivered to the 157th Ave. WWTP through and Existing Transmission Line, can be delivered to the 157th Ave. WWTP through the Dedicated Discharge Line.
- Identify the On-Site Storage Facilities needed to store CWD that will be generated by all development within the Property at Full Build-Out in excess of 500,000 gpd until the 157th Ave. WWTP has been expanded and can accept additional flows from the Property.

The completion of the foregoing Scope of Work shall be prepared based on the following assumptions and requirements:

- Following completion of the expansion of the 157th Ave. WWTP, all CWD generated from all development within the Property at Full Build-Out is to be delivered to the 157th Ave. WWTP through a Dedicated Discharge Line.
- The Phase One Development, Phase Two Development and Phase Three Development will use direct evaporative cooling (water cooled) with all other buildings to be developed on the Property using air-cooled chillers (non-water cooled).
- The operations of the Phase One Development, Phase Two Development and Phase Three Development will be limited to two (2) cycles of recirculation.
- All CWD delivered to the 157th Ave. WWTP shall comply with all applicable federal, state, county and local requirements, including the state's industrial conservation requirements, and, shall have a maximum level of TDS of the greater of 1400 mg/L or double the concentration of TDS in the water delivered to the Property (the Ultimate wastewater Discharge Requirements).
- All CWD generated from operations on the Property will be temporarily stored on the Property until the 157th Ave. WWTP has been expanded except for a maximum of 500,000 gpd of the CWD generated from the Phase One Development and the Phase Two Development.
- Once the Dedicated Discharge Line has been completed, a maximum of 500,000 gpd of CWD from the Phase One Development and the Phase Two Development shall be transmitted to the 157th Ave. WWTP through the Dedicated Discharge Line the domestic sewage from all development within the Property shall be discharged to the 157th Ave. WWTP through the Existing Transmission Line.
- The determination of the infrastructure needs set forth above shall comply with all applicable local, state, and federal rules, regulations, laws, and policies, including the requirements set forth in the City of Goodyear Engineering Design Standards and Policies Manual.

Exhibit 3

Wildlife Hazard Management Plan for PHX12-14 Data Center Evaporation Ponds, dated November, 2022, by Jacobs, and approved by the City of Goodyear on December 22, 2022

Is NOT recordable and therefore NOT recorded with this Development Agreement Amendment

Exhibit 3, Wildlife Hazard Management Plan for PHX12-14 Data Center Evaporation Ponds, dated November, 2022, by Jacobs, and approved by the City of Goodyear on December 22, 2022

is on file and can be viewed at the City of Goodyear City Clerk's Office
1900 N. Civic Square
Goodyear, AZ 85395

EXHIBIT 'A'

A PORTION OF LAND LOCATED WITHIN THE FINAL PLAT OF "AIRPORT COMMERCENTER SUBDIVISION NO. 4", ACCORDING TO BOOK 286 OF MAPS, PAGE 20, RECORDS OF MARICOPA COUNTY, ARIZONA, TOGETHER WITH ALL THAT PORTION OF LAND LOCATED WITHIN THE FINAL PLAT OF "AIRPORT COMMERCENTER SUBDIVISION NO. 2", ACCORDING TO BOOK 259 OF MAPS, PAGE 44, RECORDS OF MARICOPA COUNTY, ARIZONA, AND MORE PARTICULARLY DESCRIBED AS FOLLOWS:

BEGINNING AT A POINT LOCATED ON THE NORTH RIGHT-OF-WAY LINE OF BROADWAY ROAD ALSO BEING THE SOUTHEAST CORNER OF SAID SUBDIVISION "AIRPORT COMMERCENTER SUBDIVISION NO. 4";

THENCE NORTH 89°53'31" WEST, 1350.40 FEET ALONG SAID RIGHT-OF-WAY LINE;

THENCE NORTH 89°52'29" WEST, 1350.12 FEET CONTINUING ALONG SAID RIGHT-OF-WAY LINE;

THENCE NORTH 00°01'11" WEST, 1270.64 FEET DEPARTING FROM SAID RIGHT-OF-WAY LINE TO THE SOUTHWEST CORNER OF SAID SUBDIVISION "AIRPORT COMMERCENTER SUBDIVISION NO. 2";

THENCE CONTINUING NORTH 00°01'11" WEST, 1309.25 FEET ALONG THE WEST LINE OF AFOREMENTIONED SUBDIVISION;

THENCE SOUTH 89°35'43" EAST, 30.00 FEET TO THE EAST RIGHT-OF-WAY LINE OF LA COMETA;

THENCE ALONG SAID RIGHT-OF-WAY LINE FOR FOLLOWING SEVEN (7) CALLS;

THENCE NORTH 00°06'22" WEST, 242.70 FEET TO THE BEGINNING OF A TANGENT CURVE TO THE RIGHT HAVING A RADIUS OF 710.00 FEET;

THENCE ALONG THE ARC OF SAID CURVE THROUGH A CENTRAL ANGLE OF 26°03'44", AN ARC LENGTH OF 322.96 FEET;

THENCE NORTH 25°57'22" EAST, 100.62 FEET TO THE BEGINNING OF A TANGENT CURVE TO THE LEFT HAVING A RADIUS OF 550.00 FEET;

THENCE ALONG THE ARC OF SAID CURVE THROUGH A CENTRAL ANGLE OF 46°19'41", AN ARC LENGTH OF 444.72 FEET;

THENCE NORTH 55°55'59" EAST, 10.29 FEET TO THE BEGINNING OF A NON-TANGENT CURVE WHOSE CENTER RADIUS BEARS SOUTH 69°22'44" WEST, 560.00 FEET;

THENCE NORTHWESTERLY ALONG THE ARC OF SAID CURVE THROUGH A CENTRAL ANGLE OF 13°25'22", AN ARC LENGTH OF 131.19 FEET;

THENCE NORTH 34°02'38" WEST, 80.00 FEET TO THE NORTHWEST CORNER OF AFOREMENTIONED SUBDIVISION LOCATED ON THE SOUTHEASTERLY RIGHT OF WAY LINE OF MC 85;

THENCE NORTH 55°57'22" EAST, 2389.65 FEET ALONG SAID SOUTHEASTERLY LINE TO THE MOST NORTHERLY LINE OF AFOREMENTIONED SUBDIVISION;

EXHIBIT 'A'

THENCE SOUTH 89°10'28" EAST, 573.62 FEET ALONG SAID NORTHERLY LINE TO THE NORTHEAST CORNER OF AFOREMENTIONED SUBDIVISION;

THENCE SOUTH 00°52'11" EAST, 2614.19 FEET ALONG THE EAST LINE OF AFOREMENTIONED SUBDIVISION;

THENCE SOUTH 00°51'06" EAST, 1143.51 FEET CONTINUING ALONG SAID EAST LINE TO THE SOUTHEAST CORNER OF AFOREMENTIONED SUBDIVISION ALSO BEING THE NORTHEAST CORNER OF SAID SUBDIVISION "AIRPORT COMMERCENTER SUBDIVISION NO. 4";

THENCE SOUTH 00°51'06" EAST, 1423.35 FEET ALONG THE EAST LINE OF AFOREMENTIONED SUBDIVISION TO THE **POINT OF BEGINNING**.

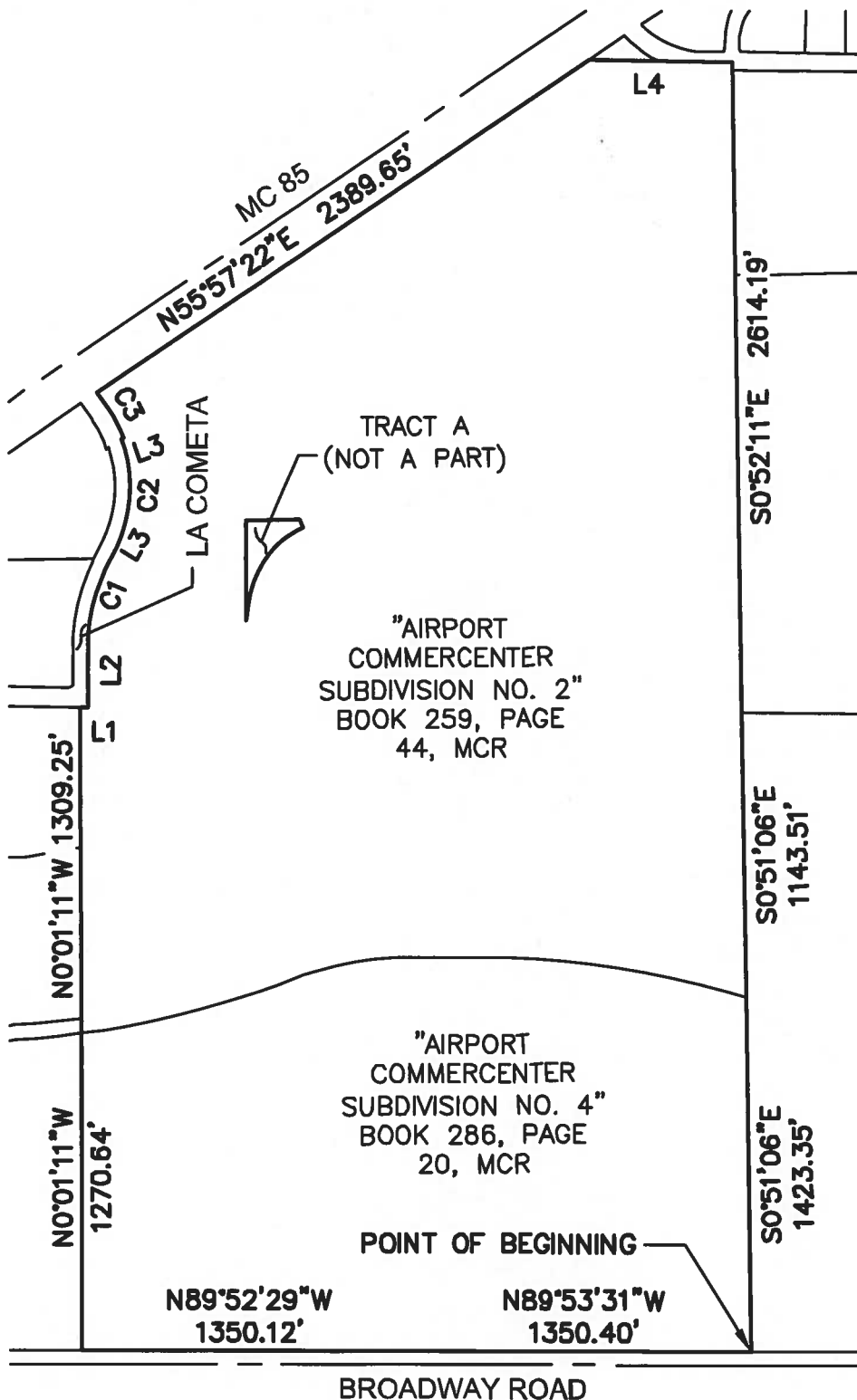
EXCEPT "TRACT A" OF SAID SUBDIVISION "AIRPORT COMMERCENTER SUBDIVISION NO. 2".

DESCRIBED AREA ABOVE CONTAINS 12,216,780 SQUARE FEET OR 281.459 ACRES MORE OR LESS.

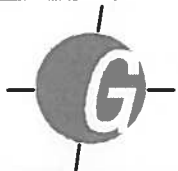
RYAN D. GILBERT, RLS
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4361 S SQUIRES LANE
GILBERT, AZ 85297
480-275-8020
PROJECT NO. 180201-LX2



EXHIBIT 'B'



NOTE: THIS EXHIBIT IS MEANT SOLELY AS A REFERENCE TO THE LEGAL DESCRIPTION TO WHICH IT IS ATTACHED AND IS NOT TO BE CONSIDERED AS A BOUNDARY SURVEY OR A LOT COMBINATION MAP.

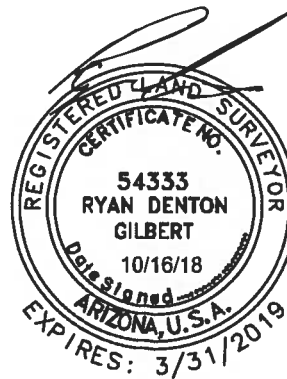


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PROJ. NO.: 180201-LX2
PAGE: 1 OF 2 PAGES
DATE: 10/16/18

EXHIBIT 'B'

LINE TABLE		
LINE	LENGTH	BEARING
L1	30.00'	S89° 35' 43"E
L2	242.70'	N0° 06' 22"W
L3	100.62'	N25° 57' 22"E
L4	10.29'	N55° 55' 59"E
L5	573.62'	S89° 10' 28"E



Curve Table					
CURVE	LENGTH	RADIUS	DELTA	CHORD	CHORD LENGTH
C1	322.96'	710.00'	26°03'44"	S12° 55' 30"W	320.18'
C2	444.72'	550.00'	46°19'41"	N2° 47' 32"E	432.70'
C3	131.19'	560.00'	13°25'22"	N27° 19' 57"W	130.89'



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 DATE: 10/16/18



Approved by City of Goodyear

12/22/22

22-62000008 - PHX13-14 DATA
CENTER - RO EXPANSION

Wildlife Hazard Management Plan
for
PHX12-14 Data Center Evaporation Ponds

Prepared for

Microsoft Corporation

5600 148th Ave NE
Redmond, WA 98052

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Final
November 2022

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Appendix B. MERLIN Bird Control Radar Systems (BCRS) Specification Sheet Example

Appendix C. Federal Aviation Administration Coordination

Appendix D. Equipment Maintenance and Monitoring Log

1.0 Introduction

Microsoft Corporation (Microsoft) plans to construct solar evaporation ponds for the PHX12-14 data centers in Goodyear, Arizona. The project area is adjacent to the Phoenix-Goodyear Airport (GYR) and the ponds have the potential to attract wildlife hazardous to aircraft, including flocking birds as well as large birds, such as waterfowl and shorebirds. Therefore, the Federal Aviation Administration (FAA) has requested that a wildlife hazard management plan (WHMP) be prepared. The purpose of this WHMP is to provide a project-specific program intended to decrease the potential risk of attracting hazardous wildlife to the adjacent aviation area.

2.0 Project Location

The project site is located at 14520 W. Broadway Road in Goodyear, Arizona, south of the Phoenix-Goodyear Airport and Maricopa Highway 85, east of S. La Cometa Road, west of S. El Cielo Road, and is bounded mainly by agricultural and industrial land. The PHX12-14 data centers and PHX09 RO treatment facility will be located in the same parcel (APN 500-07-984) as the existing PHX10 data center and PHX11 data center, which is currently under construction. The four duty-evaporation ponds will be located in the northern portion of the site (APN 500-07-989) with a spare pond located to the south (APN 500-07-984), adjacent to Maricopa County Highway 85 (MC 85) (**Figure 1**).

3.0 Project Description

Microsoft plans to construct three new data centers (PHX12, PHX13, and PHX14), construct a reverse osmosis (RO) water treatment facility, PHX09 to recycle water from the data center cooling systems for onsite reuse, and construct five evaporation ponds for the discharge of RO concentrate generated at the RO facility. The five evaporation ponds will be permitted under an Arizona Department of Environmental Quality (ADEQ) Type 3 Aquifer Protection General Permit for discharges to lined impoundments and authorized for construction and operation by Maricopa County, and the City of Goodyear. The focus of the project for the purpose of this WHMP is the construction and management of the evaporation ponds.

There will be four (4) duty ponds and one (1) spare pond that will be used to store and evaporate RO concentrate. The evaporation pond area is shown in **Figure 1**, with the data centers and RO facility located to the south of the boundary designated as the evaporation pond project area. Each pond will be a lined service impoundment using a lined secondary containment system based on the use of a dual-liner and leak detection system. Features included in the design are described in this project description. The Site Plan depicting the evaporation pond, RO facility, and data center locations is included in Appendix A.

3.1 Pond Design Features

The surface area of each duty pond will be 7.4 acres for a total of 29.6 acres for all four duty ponds combined. The ponds will be designed to accommodate the 100-year/24-hour flood

event (i.e., 3.4 inches of precipitation). The spare pond is designed with a bottom area of 3.92 acres and a top area of 5.08 acres. It is triangular in shape and will be located south of the four duty ponds. Each pond will be 8 feet deep with a working depth of 6 feet and an additional 2 feet of freeboard. The ponds will be equipped with a visual level/depth gage, instrumentation for remote level indication, instrumentation for automatic liner leak detection, actuated feed valve for remote fill/no fill control, and an access ramp for maintenance. Sides of the ponds will be sloped at a steep angle (i.e., 3:1).

Each pond will be constructed using a double liner system, with both the primary and secondary liner each comprised of 0.06-inch-thick high-density polypropylene (HDPE). The two liners will be separated by a 0.2-inch-thick geotextile net layer. Ponds will be equipped with a leak detection system. In the event of a pond liner leak, the plant control system will alarm and automatically close the pond fill valve. The system is designed to detect and respond to a leak in the upper liner, prior to leaking in the lower liner, thereby preventing leakage below the ponds into the underlying ground.

An existing 8-foot-tall site perimeter chain link fence prevents wildlife and public foot traffic into the site.

3.2 Pond Maintenance and Contingency Plan

If a leak is detected in any pond between the upper and lower liners, the pond will be immediately removed from service, and water in the pond will be manually transferred (pumped) to the spare pond. Once emptied, the liner manufacturer will be engaged to make necessary repairs to the upper liner. After repairs are completed, the pond will be placed back in service.

A spare evaporation pond has been designed as a contingency plan. The spare pond will be filled automatically through the plant control system if the level in the other ponds gets near the 6-foot mark. This is not anticipated to occur with the 30-year planned life of the ponds. The spare pond can also be used to transfer water from a problematic pond if necessary.

4.0 Overview of Wildlife Hazards to Aircraft

Based on data obtained from the National Wildlife Strike Database, there are several factors related to wildlife and aviation safety. The increase and advancements in air traffic have amplified the risk of potential strikes between aviation and wildlife. The amount of military and civilian air traffic has increased substantially worldwide (FAA and USDA, 2021). In addition, advancements in aerospace technology have enabled aircraft to become faster and quieter, making it difficult for birds to detect aircraft in time to avoid a collision. Planes are now using two engines that are more efficient than the engines previously used in four-engine planes, making aircraft more vulnerable when one engine goes down (FAA and USDA, 2021). Another factor is that the populations of many wildlife species commonly involved in strikes have increased markedly in the last few decades (FAA and USDA, 2021). As development has increased, the availability of natural or open areas that support these species has decreased. As a result of these factors, ongoing changes in the aviation industry, and changes in land use, the number of wildlife strikes on and near airports continues to increase worldwide. The FAA

wildlife strike database includes records for more than 231,000 strikes during the period from January 1, 1990, through 2020, but the FAA estimates that the database represents only a portion of the actual number of bird strikes that occurred during this period (FAA and USDA, 2021).

5.0 Wildlife Observations

In FAA AC 150/5200-33C, *Hazardous Wildlife Attractants on and Near Airports*, the FAA acknowledges that not all species pose the same risk to aircraft operations. The FAA states, “While many species of wildlife can pose a threat to aircraft safety, they are not equally hazardous” (FAA 2020). Some species may pose a greater risk to aircraft operations based on their size, behavior, abundance, or proximity to the airport and its associated airspace. The conventional guideline in assessing the threat to aviation posed by a specific species considers three priorities in descending order of severity:

- Large flocking birds, such as gulls or waterfowl;
- Small flocking birds, such as starlings; and
- Large singular birds, such as hawks or herons.

Large birds, due to their greater body mass, can strike an aircraft with greater impact and cause more damage to aircraft and affect flight. Birds that congregate in large flocks provide increased opportunities for a strike compared to solitary birds, and flocking birds have the capacity to disable more than one engine when a strike occurs. Therefore, field surveys were conducted and strike records downloaded to identify potentially hazardous species found in the project vicinity that could be attracted to a new water source.

5.1 Field Surveys

In accordance with FAA Advisory Circular 150/5200-38, three wildlife surveys were performed with at least 48 hours between survey events. One survey was conducted during each of the following times of day: early morning, midday, and early evening. All bird and mammal species observed or heard during a 5-minute period at each monitoring location were identified and counted, and their behaviors (e.g., perched, flying, loafing, foraging, swimming) were recorded.

Field surveys were conducted at ten points. Three locations were chosen at or very near the project area to identify species currently found in this area. Another seven survey points were selected within the project vicinity to view wildlife near attractants similar to this project (i.e., ponded surface water at parks, golf courses, and the Gila River). All survey points were located within 3.5 miles of the project area, as shown in **Figure 2**.

5.1.1 Survey Area

Survey points 1–3 were situated around the perimeter of the property boundary for the project area. The remainder of the points surveyed were adjacent to water features with the potential to attract similar hazardous wildlife as the evaporation ponds in the project area. The following is a brief description of each survey point:

-
- Survey Point 1: adjacent to a fallow agricultural field west of the project area
 - Survey Point 2: adjacent to a fallow agricultural field north of the project area
 - Survey Point 3: adjacent to a fallow agricultural field on the east side of the project area
 - Survey Point 4: adjacent to a pond east of the project area with emergent marsh vegetation in several locations along the perimeter
 - Survey Point 5: adjacent to a portion of the Gila River with ponded surface water and xeroriparian vegetation south of the project area
 - Survey Point 6: adjacent to a golf course lake southwest of the project area
 - Survey Point 7: adjacent to a pond at a ballpark where small to large fish and people fishing were observed northwest of the project area
 - Survey Point 8: adjacent to a retention pond immediately east of the Phoenix-Goodyear Airport north of the project area
 - Survey Point 9: adjacent to a golf course lake north of the project area
 - Survey Point 10: adjacent to a golf course lake northeast of the project area



Figure 2. Survey Point Locations

5.1.2 Survey Results

A total of three wildlife surveys were conducted for the project during which approximately 26 bird species were identified and 920 birds were recorded. Overall survey results are summarized in **Table 1**.

Table 1. Overall Abundance of Birds in the Areas Surveyed

Guild and Common Name	Scientific Name	Guild and Species Abundance	Guild and Species Relative Abundance
Blackbirds and Starlings		141	15.3%
European Starling	<i>Sturnus vulgaris</i>	3	0.3%
Great-tailed Grackle	<i>Quiscalus mexicanus</i>	138	15.0%
Doves and Pigeons		643	69.9%
Eurasian Collared-Dove	<i>Streptopelia decaocto</i>	2	0.2%
Mourning Dove	<i>Zenaida macroura</i>	430	46.7%
Rock Pigeon	<i>Columba livia</i>	29	3.2%
White-winged Dove	<i>Zenaida asiatica</i>	182	19.8%
Raptors		2	0.2%
Burrowing Owl	<i>Athene cunicularia</i>	1	0.1%
Turkey Vulture	<i>Cathartes aura</i>	1	0.1%
Shorebirds		36	3.9%
Black-crowned night heron	<i>Nycticorax nycticorax</i>	2	0.2%
Black-necked stilt	<i>Himantopus mexicanus</i>	4	0.4%
Great Blue Heron	<i>Ardea herodias</i>	3	0.3%
Killdeer	<i>Charadrius vociferus</i>	20	2.2%
Snowy egret	<i>Egretta thula</i>	7	0.8%
Songbirds		26	2.8%
Black Phoebe	<i>Sayornis nigricans</i>	1	0.1%
House Finch	<i>Haemorhous mexicanus</i>	19	2.1%
Northern Mockingbird	<i>Mimus polyglottos</i>	2	0.2%
Unidentified Hummingbird	<i>Trochilidae (gen, sp)</i>	2	0.2%
Verdin	<i>Auriparus flaviceps</i>	2	0.2%
Waterfowl and Waterbirds		42	4.6%
American Coot	<i>Fulica americana</i>	11	1.2%
Double-crested cormorant	<i>Phalacrocorax auritus</i>	27	2.9%
Mallard	<i>Anas platyrhynchos</i>	4	0.4%
Other		30	3.3%
Cliff Swallow	<i>Petrochelidon pyrrhonota</i>	19	2.1%
Gambel's Quail	<i>Callipepla gambelii</i>	1	0.1%

Table 1. Overall Abundance of Birds in the Areas Surveyed

Guild and Common Name	<i>Scientific Name</i>	Guild and Species Abundance	Guild and Species Relative Abundance
Gila Woodpecker	<i>Melanerpes uropygialis</i>	2	0.2%
Greater Roadrunner	<i>Geococcyx californianus</i>	1	0.1%
Lesser nighthawk	<i>Chordeiles acutipennis</i>	7	0.8%
Total (25 species)		920	100.0%

Table 2 Identifies the number of birds of each guild observed at each survey point. The most birds were detected at the three points near the project area because large numbers of pigeons and doves were observed flying over this area. **Figure 3** portrays the number of birds recorded at each of the hazardous wildlife attractants (i.e., water features) surveyed.

Table 2. Abundance of Birds at Each Survey Point

Survey Point	Blackbirds and Starlings	Doves and Pigeons	Raptors	Shorebirds	Songbirds	Waterfowl and Waterbirds	Other
1	4	106	0	0	1	0	0
2	0	208	0	0	0	0	0
3	3	107	0	0	13	0	0
4	31	40	0	0	1	3	0
5	3	8	1	27	0	0	2
6	28	42	0	0	0	5	7
7	11	32	0	4	5	1	0
8	9	27	0	4	2	10	0
9	25	28	0	1	1	0	2
10	27	45	1	0	3	0	0

It should be noted that at Point 7 there was a great blue heron observed wading in the water, and it is assumed this is likely a common occurrence due to the presence of numerous fish in that pond. A direct line from Point 7 to the project area crosses the Phoenix-Goodyear Airport over the south end of the runway.

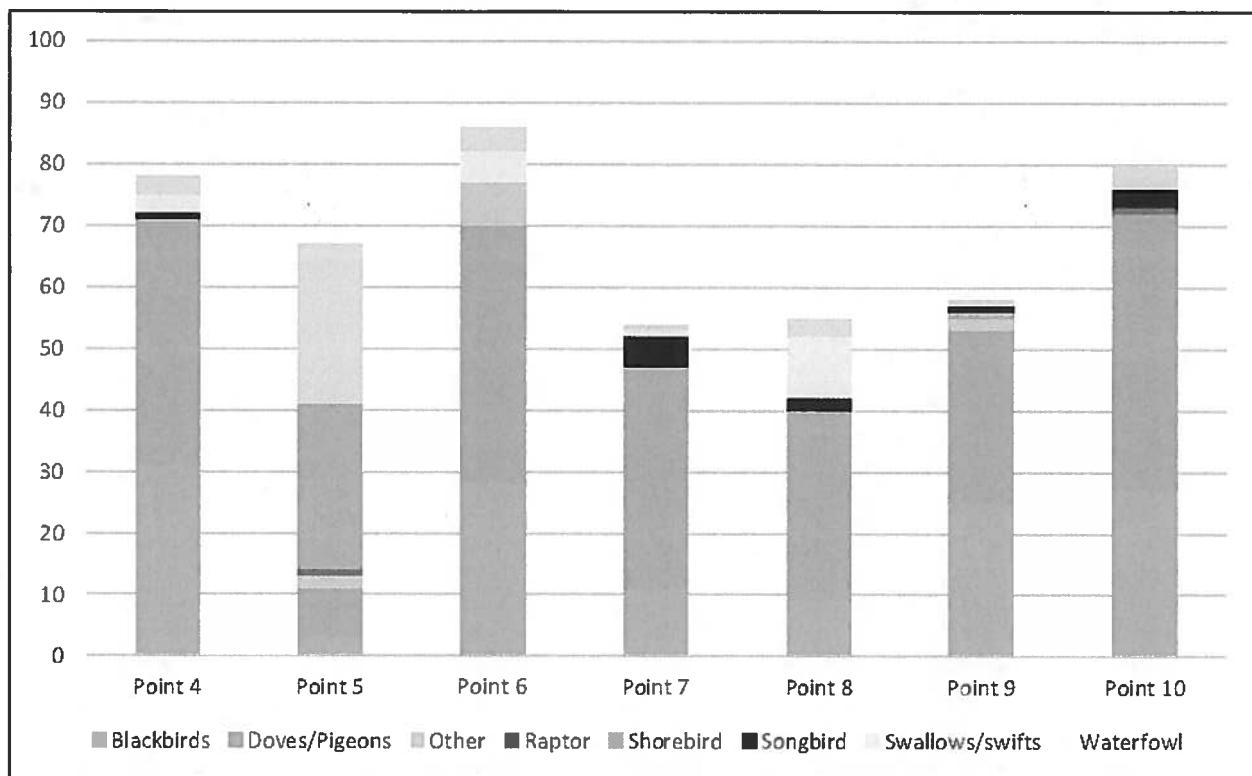


Figure 3. Number of Birds in Each Guild Observed Near Hazardous Wildlife Attractants

In AC 150/5200-32B, FAA (2013) provides a composite ranking of 50 bird and mammal species or groups by their relative hazard to aircraft in airport environments. Each of these species or groups has at least 100 reported strikes in the FAA strike database. A composite ranking is derived from three criteria (damage, major damage, and effect on flight). **Table 3** lists the composite ranking for bird species detected during field surveys; with a ranking of 1 being most hazardous.

Table 3. Composite Ranking of the Relative Hazards to Aviation of the Species Observed During Field Surveys

Species	Composite Rank*	Species	Composite Rank*
Double-crested cormorant	7	European starling	25
Mallard	8	Mourning dove	30
Great blue heron	10	Killdeer	35
American coot	11	Burrowing owl	46
Rock pigeon	17		

Source: FAA 2013
 * composite ranking of 50 wildlife species (1 = most hazardous, 50 = least hazardous)

The remainder of this results section discusses the species guilds observed at the hazardous wildlife attractants surveyed within the vicinity of the project area, including the relative risk posed to aircraft by species of that guild.

Blackbirds and Starlings

Blackbirds and starlings are medium-sized birds found in a variety of habitats from urban to rural environments. They pose a significant hazard to aircraft because of their dense size and flocking behavior. Blackbirds and starlings are attracted to open, grassy areas in which to forage, a water source, and trees or structures for perching and roosting. Two species of this guild were observed during the field surveys: great-tailed grackles and European starlings. During field surveys, 141 blackbirds and starlings were observed, comprising 15.3 percent of the total number of individual birds observed.

These species have a high likelihood of being involved in strikes with aircraft. When strikes with these species occur, they usually involve multiple birds that can be ingested by aircraft engines, and the severity of strikes associated with these species is moderate. The FAA assigns a composite hazard ranking of 20 to blackbirds/starlings.

Doves and Pigeons

Doves and pigeons are medium-sized birds that can pose hazards to aircraft operations because of their abundance and flocking behavior. These species are found in open areas and in areas with human activity, such as parks and agricultural operations. Four species of this guild were observed: mourning dove, white-winged dove, Eurasian collared-dove, and rock pigeons. During field surveys, 643 doves and pigeons were observed, comprising 69.9 percent of the total number of individual birds observed.

The species associated with this guild show a moderate likelihood of being involved in a conflict with aircraft and strikes with these species can result in a moderate impact on flight due to their flocking behavior. The FAA assigns a composite hazard ranking of 13 to pigeons and 18 to mourning doves out of 25 ranked species. Doves and pigeons have the potential to cause a high degree of impact on flight.

Raptors

Raptors are predatory birds and scavengers with sharp talons and hooked beaks for capturing and feeding on prey. Raptors pose a threat to aircraft because of their large size and flight behavior. Two species were observed during field surveys: burrowing owl and turkey vulture.

Raptors have a moderate likelihood of being involved in a strike with aircraft, and they can create a high degree of impact on flight due to their size. The FAA assigns a composite hazard ranking of 11 to hawks out of 25 ranked species.

Shorebirds and Waders

Shorebirds can vary from birds with short, stocky builds and short bills to tall, slender birds with long legs and long bills. Killdeer accounted for the majority of individuals observed in this guild. Killdeer frequent open grassy areas and occasionally are found in flocks, but usually occur alone

or in pairs. Five species of shorebirds and waders were observed during the field surveys: black-crowned night heron, black-necked stilt, great blue heron, killdeer, and snowy egret.

Shorebirds, especially killdeer, have a high probability of being involved in a strike with aircraft, and the resultant impact can vary significantly according to the species involved. Typically, shorebirds would create a low impact on an aircraft flight due to their solitary behavior. The FAA assigns a composite hazard ranking of 19 to shorebirds out of 25 ranked species.

Songbirds

Songbirds include approximately 4,000 species or nearly half of the world's birds. Songbirds vary greatly in size, and their diets vary among species. Most songbirds do not pose a threat to aircraft, but some songbirds travel in large flocks, such as the horned lark, which can pose a greater threat. Five songbird species were observed during the field surveys: black phoebe, house finch, northern mockingbird, hummingbird, and verdin.

Songbirds have a moderate likelihood of being involved in a strike with aircraft, and they create a low degree of impact on flight due to their size. One strike with a horned lark has been recorded at GYR.

Waterfowl and Waterbirds

Waterfowl and water birds are large aquatic birds that pose one of the most serious threats to aircraft because of their abundance, size, and flocking behavior. These species are attracted to open water ponds and basins to feed, nest, loaf, and escape predators. Three species of waterfowl and water birds were observed during the field surveys: American coots, double-crested cormorants, and mallards. Forty-two waterfowl and water birds were observed during surveys, comprising 4.6 percent of the total number of individual birds observed.

Waterfowl and water birds are known to pose a risk to aircraft and human health and safety. The members of this guild have a high likelihood of being involved in a wildlife strike based on their size and flocking behavior. The FAA ranks ducks as seventh overall in its composite ranking of hazardous wildlife species. All species of this guild have the potential to cause a high degree of impact on flight.

5.2 Strike Records

The FAA's wildlife strike database was queried to obtain information on the number and types of wildlife strikes that have occurred at GYR since 1990. The FAA records help to identify the species responsible for documented wildlife strikes in the vicinity of the project area. According to the FAA database, 49 bird strikes were reported at or near GYR from 1990-2022. **Table 4** presents the list of species that were reported as strikes at or near GYR and the includes the number of records for each species. Most species were observed during field surveys described earlier in this section; however, a few additional species are listed, including American kestrel, barn swallow, and horned lark.

Table 4. Number of Bird Strikes by Species at the Phoenix-Goodyear Airport 1990-2022

Common Name	Scientific Name	Number of Strike Records
American kestrel	<i>Falco sparverius</i>	3
Barn swallow	<i>Hirundo rustica</i>	1
Burrowing owl	<i>Athene cunicularia</i>	2
Dove	Unknown	3
Horned lark	<i>Eremophila alpestris</i>	1
House finch	<i>Haemorhous mexicanus</i>	1
Mourning dove	<i>Zenaida macroura</i>	9
Rock pigeon	<i>Columba livia</i>	5
Sparrow	Unknown	1
Turkey vulture	<i>Cathartes aura</i>	2
Unknown	Unknown	21
Total		49

5.3 Survey Conclusions and Recommendations

Results of the field surveys and a review of the strike database for GYR indicate that a variety of bird species considered hazardous to aviation are present in the vicinity of the project area. Large waterfowl and water birds were observed using water features near the project area. Additionally, large numbers of doves and pigeons currently fly over the area where the ponds will be installed, and these species make up the majority of the strikes recorded at GYR where the species was known. Therefore, installation of a bird deterrent system at the evaporation ponds is recommended to discourage birds from using habitat in the project area.

6.0 Wildlife Management Strategies

The evaporation ponds in the project area have the potential to attract avian populations, including waterfowl, shorebirds, and other resident and migratory species that are hazardous to aircraft. Therefore, this section outlines design features for the evaporation ponds that would seek to make the water less attractive to birds.

6.1 Current Design Features of the Evaporation Ponds

Design features of the evaporation ponds that would deter use by waterfowl, water birds, shorebirds, and other resident and migratory species include characteristics that make the pond water less available to birds. The ponds include an operational depth of 6 feet and a freeboard of 2 feet, making it difficult for shorebirds and perching birds to reach the water from the perimeter. In addition, the interior sides of the ponds are relatively steep at a 33 percent slope (3:1). Furthermore, the double-liner with leak detection system will prevent growth of vegetation (i.e., nesting or foraging habitat) in the pond.

The project design will include requirements for a radar-based bird prevention system using multiple modes of deterrence including directed, focused beam bioacoustics, and laser. These methods will be implemented to detect and deter birds from entering the evaporation pond

area. The system will include a master control radar system that will detect birds approaching the pond out to 1 kilometer (km) minimum and provide automated activation of deterrents. The directed bioacoustics will project a focused beam of sound effective for bird control up to 1 km, encompassing full pond area coverage, while minimizing spillover nuisance noise. Laser deterrents will be an eye-safe green laser and will be computer controlled to project various patterns over the pond area. The system will include a real-time master display showing bird detections and tracks, deterrents status, and system health and status. The system to be used will be the Merlin system by DeTect Inc (DeTect 2022) or equivalent. The manufacturer's specifications for the DeTect system are provided in Appendix B for reference.

Vegetation that provides food or cover for hazardous wildlife will be prevented from growing within the ponds and eliminated around the evaporation ponds. As mentioned in the section above, a double-liner system will be used that will seek to prevent vegetation growth inside the ponds. Around the ponds, the area will be maintained with gravel or bare ground as feasible, without landscaped vegetation.

These design features will be implemented and maintained as the basis of the project's bird deterrent system. The design features have been submitted for review in the FAA obstruction evaluation portal and a description of that coordination is included in Appendix C.

6.2 Bird Deterrent Contingency Plan

A wire grid will be installed over the ponds as a back-up bird deterrent if the Merlin BCRS fails to perform satisfactorily. Thresholds for implementing this contingency plan include bird deterrence rates at the project site lower than 95% and/or any dead birds found at the evaporation ponds. Several companies provide wire grid systems, including Bird Barrier (<https://birdbarrier.com/gridwire/>), Bird-B-Gone (<http://www.birdbgone.com/products/bird-wire/>), and Aviaway Bird Control Services (<http://www.aviaway.com/seagull-control-deterrent-grid-wire>). The selected provider for the wire grid will be notified within 7 days of the threshold breach, and installation of the wire grid will be scheduled for the next available appointment.

6.3 Maintenance and Monitoring of Equipment

Bird deterrent equipment will be checked weekly to ensure the radar equipment and deterrents are working properly. If repairs are needed, that will be noted in the log and the problem fixed as soon as practicable. A signature, date, and time will be recorded in a log by the person conducting the equipment check. An example log is included in Appendix D of this WHMP. The maintenance log will be made available to City of Phoenix Aviation within 2 weeks of City of Phoenix Aviation Department's request to Microsoft (or future operator of the site).

Microsoft shall allow City of Phoenix Aviation to enter and inspect the wildlife deterrent system within 2 weeks of City of Phoenix Aviation's request to Microsoft (or future operator of the site).

Within 3 years from the start of operation of the ponds (and not more than 4 years from that date), Microsoft (or future operator of the site) shall have a qualified wildlife biologist update the WHMP (including updated wildlife surveys), analyze the effectiveness of the deterrent

systems and make recommendations for future improvements/continued use. The updated WHMP shall be provided to City of Phoenix Aviation within 60 days of completion of the WHMP update.

7.0 References

DeTect. 2022. Bird Control Radar Systems. Available online at: <http://www.detect-inc.com/>.

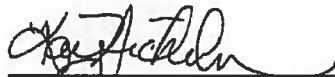
Federal Aviation Administration. 2013. Reporting Wildlife Aircraft Strikes, AC 150/5200-32B, May 31, 2013, 11pp.

Federal Aviation Administration. 2020. Hazardous Wildlife Attractants on or Near Airports, AC 150/5200-33C, February 21, 2020, 47pp.

Federal Aviation Administration and United States Department of Agriculture Animal Plant Health Inspection Service. 2021. Wildlife Strikes to Civil Aircraft in the United States 1990-2020. Available online at: https://www.faa.gov/airports/airport_safety/wildlife/media/Wildlife-Strike-Report-1990-2020.pdf.

8.0 Author

Prepared By:



Kay Nicholson

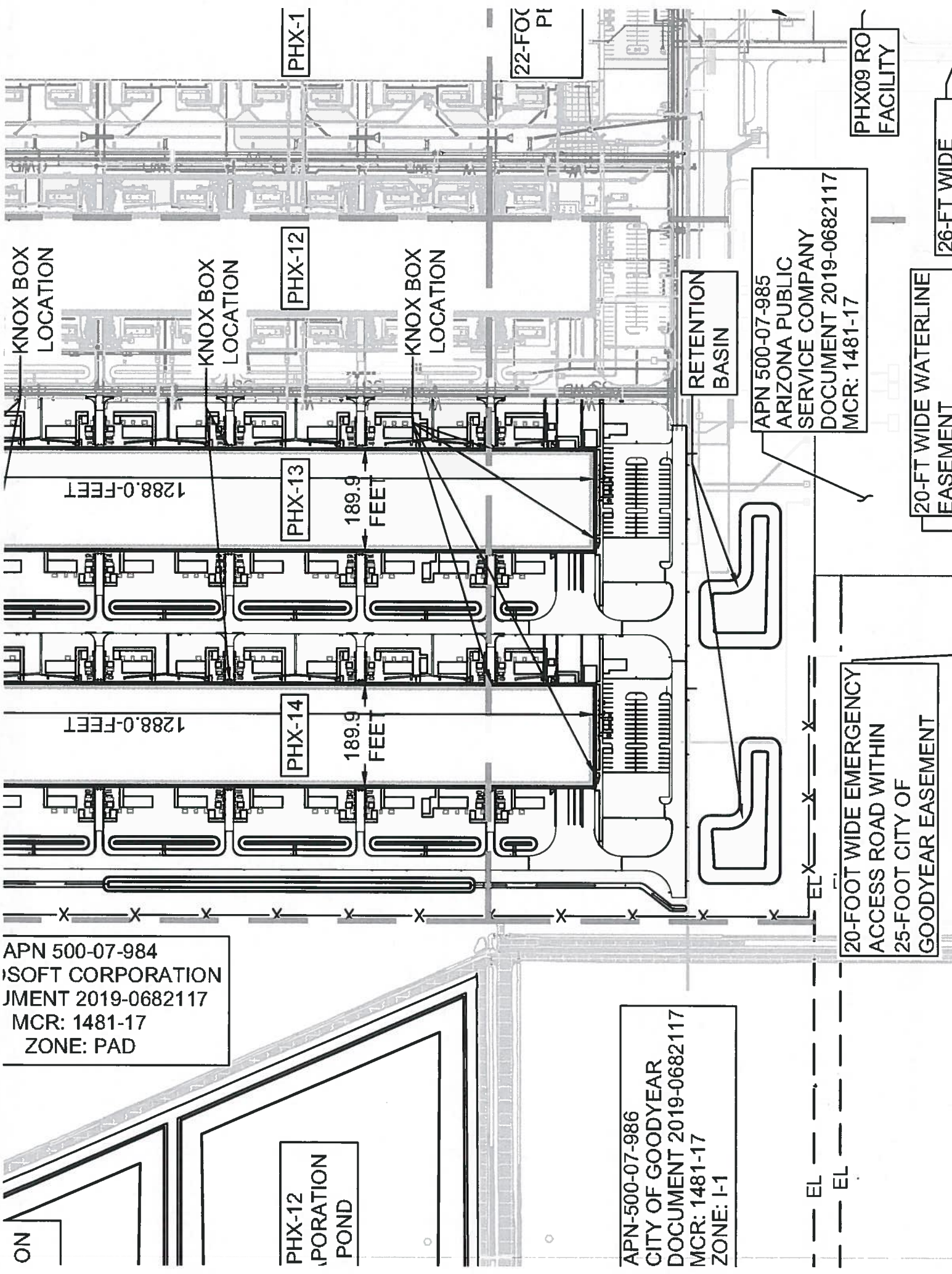
Qualified Airport Wildlife Biologist

Jacobs Engineering Group Inc.

Date: November 22, 2022

Appendix A

Site Plan Depicting Evaporation Ponds, RO Facility, and Data Centers



KNOX BOX
LOCATION

KNOX BOX
LOCATION

KNOX BOX
LOCATION

PHX-1

PHX-12

PHX-13

PHX-14

22-FOOT
WATERLINE
EASEMENT

PHX09 RO
FACILITY

RETENTION
BASIN

APN 500-07-985
ARIZONA PUBLIC
SERVICE COMPANY
DOCUMENT 2019-0682117
MCR: 1481-17

20-FT WIDE WATERLINE
EASEMENT

26-FT WIDE

1288.0-FEET

189.9
FEET

1288.0-FEET

189.9
FEET

APN 500-07-984
SOFT CORPORATION
DOCUMENT 2019-0682117
MCR: 1481-17
ZONE: PAD

PHX-12
CORPORATION
POND

APN-500-07-986
CITY OF GOODYEAR
DOCUMENT 2019-0682117
MCR: 1481-17
ZONE: I-1

20-FOOT WIDE EMERGENCY
ACCESS ROAD WITHIN
25-FOOT CITY OF
GOODYEAR EASEMENT

EL

EL

ON

Appendix B

MERLIN Bird Control Radar Systems (BCRS) Specification Sheet Example

Bird Control Radar System (BCRS)

The most widely used & tested bird radar system with over 250 units operating worldwide in bird control & aviation safety.

Fully self contained, networked units with the capability to custom define multiple, zoned control perimeters.

Engineered & manufactured for dependable 24-7 operation with high reliability & low maintenance.

Software controlled allowing for custom, user-defined control zones.



Multi-unit networks can be provided to cover numerous control zones over large areas.

DeTect's MERLIN BCRS is an advanced radar system designed to monitor user-defined bird control zones, automatically activating bird deterrent devices to deter and harass birds entering restricted areas.

The system is based on DeTect's proven **MERLIN Avian Radar System** technology that is used by the USAF, NASA and airports worldwide to detect and monitor hazardous bird activity on and around airfields for bird-aircraft strike hazard management.

MERLIN BCRS detect & deter applications include control of birds at industrial waste impoundments, oil & gas drilling frac ponds, landfills, stormwater retention basins, crop fields and sites of various size that require automated bird control.



Model: MERLIN Bird Control Radar Systems (BCRS)

Application: Real-time, automatic bird control for industrial impoundments, oil & gas waste ponds, landfills & other large exclusion areas

Configuration: Single or multi-unit networked fixed, skid-mounted or mobile radar packages

Sensors: 200w Horizontal Surveillance Radar (HSR) Solid-state sensors (50,000 hour MTBF) All weather bird detection

Operation: Automated detection & non-lethal hazing of birds. Deterrent device options include Acoustic Hazing Devices (AHD's), lasers, robotic falcons, propane cannons, bioacoustics & effigies

Operating Range: 360-degree continuous monitoring with unlimited programmable control zones for areas in size from under 1 acre (0.4 ha) to over 10 square miles (25 square km)

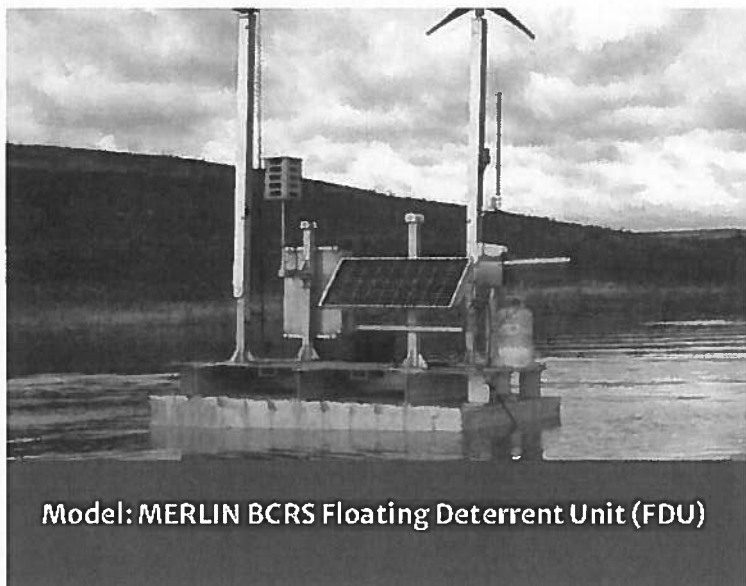
Power: Single Phase 110/220 VAC, 60/30 amps service with UPS back-up & power conditioning (30 minutes) & optional auto-start single or dual 5 kW diesel generator & fuel tank to support 10-20 days 24-7 operation

Network: TCP/IP supports multi-user web-based remote real-time system display, control & data access via fiber optic, or wireless WAN



Offices in: Florida • California • Hawaii • Calgary • London • Beijing

www.detect-inc.com



Model: MERLIN BCBS Floating Deterrent Unit (FDU)

DeTect's MERLIN BCBS is software controlled and allows for custom, user-defined control zones.

Birds detected entering the control area trigger activation of the deterrent devices. Systems are available as fully self-contained and powered fixed, skid-mounted, or mobile units.

Multi-unit networks can be provided to cover numerous control zones over large areas. The system interfaces with a wide variety of non-lethal bird deterrent devices including bioacoustics and propane cannons, Long Range Acoustic Devices (LRAD), and DeTect's Programmable Bird Control Laser system.

MERLIN BCBS uses automated, randomized deterrent selection to vary the deterrent selection and volume applied with each response to reduce habituation. The system includes a library of standard recorded acoustic deterrent files or can use client-provided sound files.

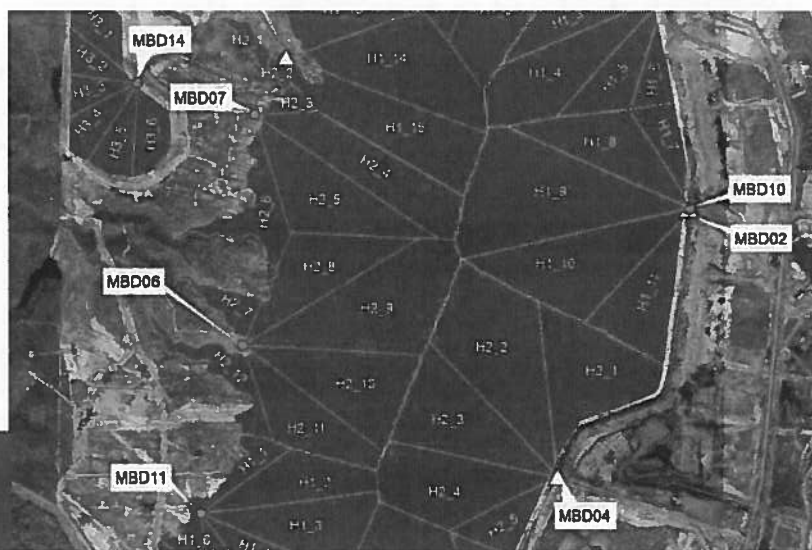


MERLIN BCBS is a complete turnkey system that includes the bird control radar master unit (radar sensor, tower (if required), processor equipment, software and equipment enclosure), deterrent devices, installation, start-up and support, or can be integrated with existing deterrent systems.

Systems provide reliable bird detection and deterrent hazing in virtually any terrain, over water and weather conditions, including in fog, rain and snow.

MERLIN systems are fully remote controllable and networkable through TCP/IP, wireless wide area network (WAN) and other protocols. All equipment is industrial-grade and designed for use in outdoor and extreme environments with exceptionally high reliability.

The MERLIN radar and processor equipment are housed in a NEMA outdoor rated, environmentally controlled enclosure mounted on the trailer, tower, or a separate foundation.



Each system includes an available 1-year parts and labor warranty and 24-7 technical support provided by DeTect's technical support team, which includes biologists, radar ornithologists, technicians, and hardware & software engineers.

MERLIN technology has been tested and proven at installations throughout North America, Europe, Africa, the Middle East, and Far East, and represents the most advanced avian radar and bird control technology on the market.



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Appendix C

Federal Aviation Administration Coordination

On September 22, 2022, project information was entered electronically for form 7460-1 through the Federal Aviation Administration Obstruction Evaluation portal (FAA OE portal: <https://oeaaa.faa.gov/oeaaa/external/portal.jsp>). At that time, a draft of this Wildlife Hazard Management Plan (dated July 21, 2022) was uploaded to the FAA OE portal as supporting documentation. The assigned case number for this project is 2022-AWP-18249-OE.

On October 20, 2022, FAA posted a letter to the case file for this project through the FAA OE portal requesting verification of the project height. A letter in response was uploaded later that day, indicating that the evaporation ponds are at ground level; however, the height of the Merlin BCRS had not been included previously, so it was clarified that the overall project height is approximately 16 feet.

Also on October 20, 2022, the Phoenix Aviation Department approved edits to the WHMP. Therefore, a second letter was uploaded to the FAA OE portal that included excerpts from the revised WHMP (i.e., the two sections with substantive changes – an added section with provisions for a wire grid to be installed as a back-up bird deterrent system if the Merlin BCRS is ineffective and updates to the section identifying maintenance and monitoring of equipment).

A letter from FAA with a determination of “no hazard to air navigation” was received for this project through the FAA OE portal on November 2, 2022.

A printout of the summary page for this case from the FAA OE portal and the determination letter from FAA are included in this appendix.



Notice of Proposed Construction or Alteration - Off Airport

Add a New Case (Off Airport) - Desk Reference Guide V. 2018 2.1

Add a New Case (Off Airport) for Wind Turbines - Met Towers (with WT Farm) - WT-Barge Crane - Desk Reference Guide V. 2018 2.1

Project Name: MICRO-000748508-22

Sponsor: Microsoft Corporation

Details for Case : Evaporation ponds

[Show Project Summary](#)

Case Status

ASN: 2022-AWP-18249-OE
Status: Work In Progress

Public Comments: None

Date Accepted: 09/22/2022

Date Determined:

Letters: 10/20/2022 ADD

Documents: 10/20/2022 Revisions_to_WHMP...

10/20/2022 Response_to_FAA_R...

09/22/2022 Draft Wildlife Ma...

Project Documents:
None

Construction / Alteration Information

Notice Of: Construction

Duration: Permanent

if Temporary: Months: Days:

Work Schedule - Start:

Work Schedule - End:

*For temporary cranes-Does the permanent structure require separate notice to the FAA?
To find out, use the Notice Criteria Tool. If separate notice is required, please ensure it is filed.
If it is not filed, please state the reason in the Description of Proposal.

State Filing:

Structure Summary

Structure Type: TANK | Tank

Structure Name: Evaporation ponds

FDC NOTAM:

NOTAM Number:

FCC Number:

Prior ASN:

Structure Details

Latitude: 33° 25' 3.90" N
Longitude: 112° 21' 53.75" W
Horizontal Datum: NAD83
Site Elevation (SE): 962 (nearest foot) PASSED
Structure Height (AGL): 16 (nearest foot)
Current Height (AGL): (nearest foot)

* For notice of alteration or existing provide the current
AGL height of the existing structure.
Include details in the Description of Proposal

Minimum Operating Height (AGL): (nearest foot)

* For aeronautical study of a crane or construction equipment
the maximum height should be listed above as the
Structure Height (AGL). Additionally, provide the minimum
operating height to avoid delays if impacts are identified that
require negotiation to a reduced height. If the Structure Height
and minimum operating height are the same enter the same
value in both fields.

Requested Marking/Lighting: None

Other :

Recommended Marking/Lighting:

Current Marking/Lighting: None

Other :

Nearest City: Goodyear

Nearest State: Arizona

Description of Location:
On the Project Summary page upload any certified survey.
The site is immediately south of Hwy 85,
south of the Phoenix Goodyear Airport.
The site address is:
14520 W Broadway Rd
Goodyear, AZ 85338

Description of Proposal:
A radar-based bird prevention system
(Merlin system by DeFect Inc, or
equivalent) is proposed to detect and
deter birds at least 1 km away. The
deterrents will include a focused beam of
sound and a computer-controlled eye-safe
green laser that will project various
patterns over the ponds.

Proposed Frequency Bands

Low Freq	High Freq	Freq Unit	ERP	ERP Unit



Mail Processing Center
Federal Aviation Administration
Southwest Regional Office
Obstruction Evaluation Group
10101 Hillwood Parkway
Fort Worth, TX 76177

Aeronautical Study No.
2022-AWP-18249-OE

Issued Date: 11/02/2022

Joe Chiovare
Microsoft Corporation
5600 148th Ave NE
Redmond, WA 98052

**** DETERMINATION OF NO HAZARD TO AIR NAVIGATION ****

The Federal Aviation Administration has conducted an aeronautical study under the provisions of 49 U.S.C., Section 44718 and if applicable Title 14 of the Code of Federal Regulations, part 77, concerning:

Structure:	Tank Evaporation ponds
Location:	Goodyear, AZ
Latitude:	33-25-03.90N NAD 83
Longitude:	112-21-53.75W
Heights:	962 feet site elevation (SE) 16 feet above ground level (AGL) 978 feet above mean sea level (AMSL)

This aeronautical study revealed that the structure does not exceed obstruction standards and would not be a hazard to air navigation provided the following condition(s), if any, is(are) met:

It is required that FAA Form 7460-2, Notice of Actual Construction or Alteration, be e-filed any time the project is abandoned or:

- ☐ At least 10 days prior to start of construction (7460-2, Part 1)
☒ Within 5 days after the construction reaches its greatest height (7460-2, Part 2)

Based on this evaluation, marking and lighting are not necessary for aviation safety. However, if marking/lighting are accomplished on a voluntary basis, we recommend it be installed in accordance with FAA Advisory circular 70/7460-1 M.

This determination expires on 05/02/2024 unless:

- the construction is started (not necessarily completed) and FAA Form 7460-2, Notice of Actual Construction or Alteration, is received by this office.
- extended, revised, or terminated by the issuing office.
- the construction is subject to the licensing authority of the Federal Communications Commission (FCC) and an application for a construction permit has been filed, as required by the FCC, within 6 months of the date of this determination. In such case, the determination expires on the date prescribed by the FCC for completion of construction, or the date the FCC denies the application.

NOTE: REQUEST FOR EXTENSION OF THE EFFECTIVE PERIOD OF THIS DETERMINATION MUST BE E-FILED AT LEAST 15 DAYS PRIOR TO THE EXPIRATION DATE. AFTER RE-EVALUATION OF CURRENT OPERATIONS IN THE AREA OF THE STRUCTURE TO DETERMINE THAT NO SIGNIFICANT AERONAUTICAL CHANGES HAVE OCCURRED, YOUR DETERMINATION MAY BE ELIGIBLE FOR ONE EXTENSION OF THE EFFECTIVE PERIOD.

This determination is based, in part, on the foregoing description which includes specific coordinates, heights, frequency(ies) and power. Any changes in coordinates, heights, and frequencies or use of greater power, except those frequencies specified in the Colo Void Clause Coalition; Antenna System Co-Location; Voluntary Best Practices, effective 21 Nov 2007, will void this determination. Any future construction or alteration, including increase to heights, power, or the addition of other transmitters, requires separate notice to the FAA. This determination includes all previously filed frequencies and power for this structure.

If construction or alteration is dismantled or destroyed, you must submit notice to the FAA within 5 days after the construction or alteration is dismantled or destroyed.

This determination does include temporary construction equipment such as cranes, derricks, etc., which may be used during actual construction of the structure. However, this equipment shall not exceed the overall heights as indicated above. Equipment which has a height greater than the studied structure requires separate notice to the FAA.

This determination concerns the effect of this structure on the safe and efficient use of navigable airspace by aircraft and does not relieve the sponsor of compliance responsibilities relating to any law, ordinance, or regulation of any Federal, State, or local government body.

If we can be of further assistance, please contact our office at (847) 294-7575, or vivian.vilaro@faa.gov. On any future correspondence concerning this matter, please refer to Aeronautical Study Number 2022-AWP-18249-OE.

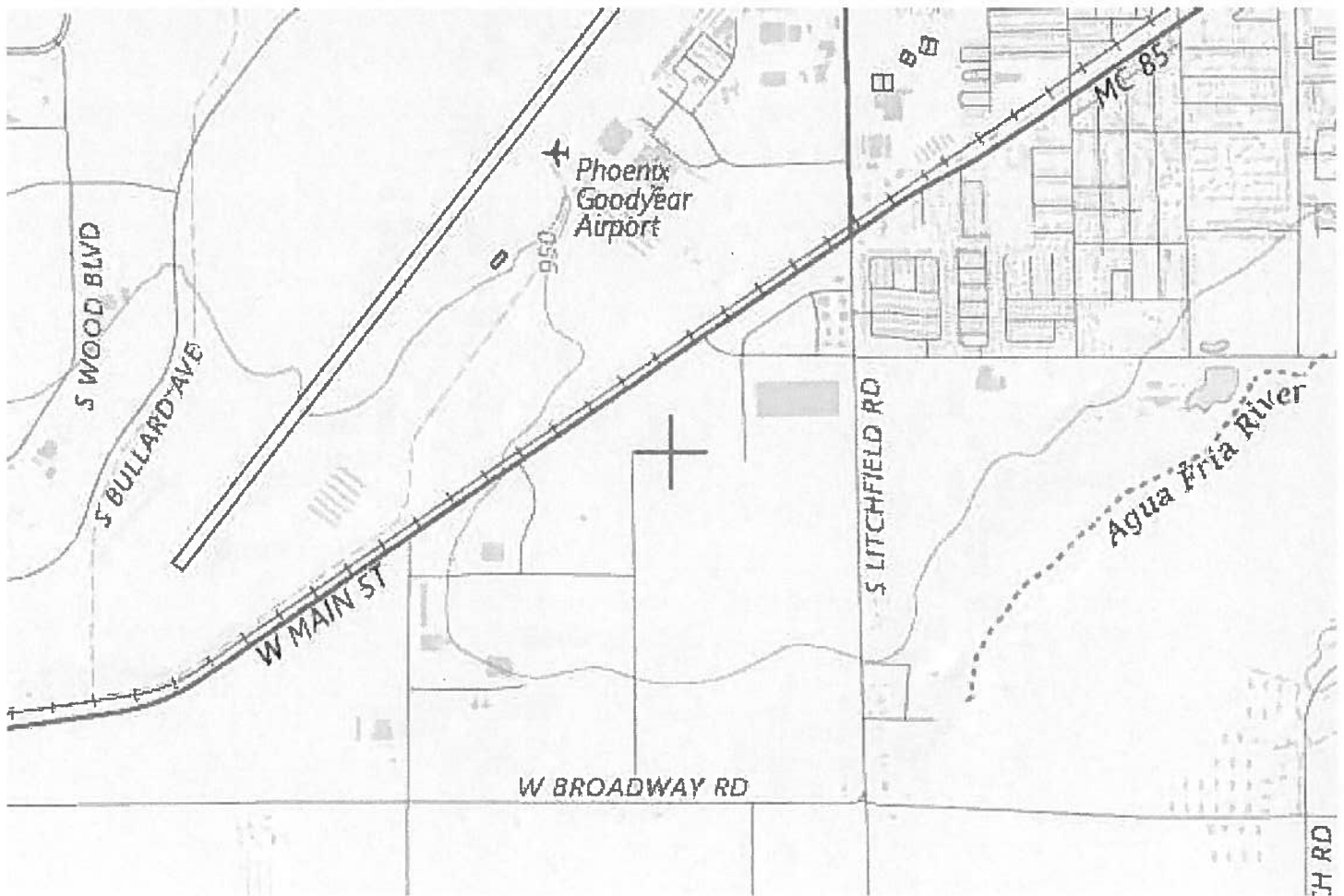
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(DNE)

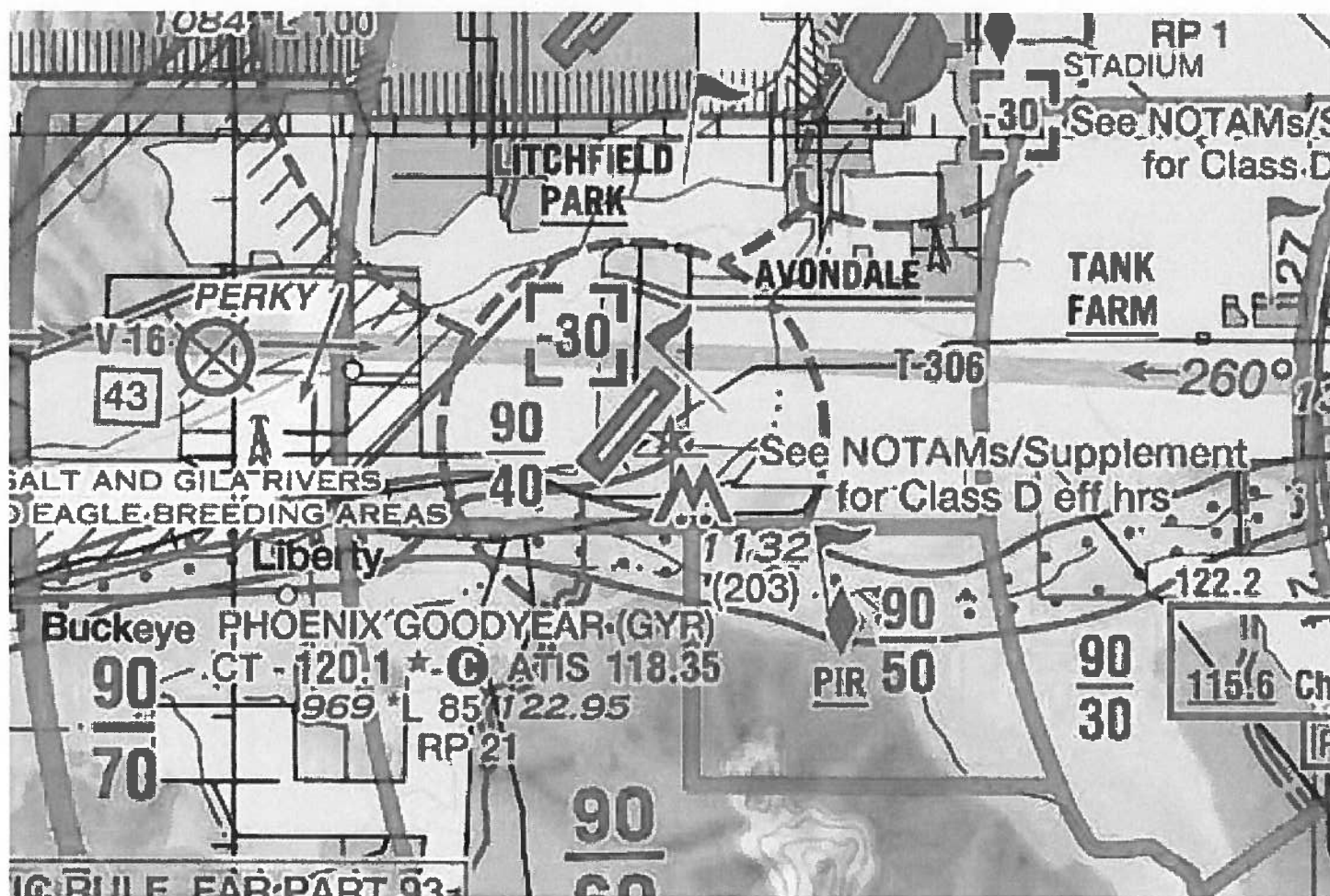
Vivian Vilaro
Specialist

Attachment(s)
Map(s)

TOPO Map for ASN 2022-AWP-18249-OE



Sectional Map for ASN 2022-AWP-18249-OE



Appendix D

Equipment Maintenance and Monitoring Log

